

Conducted test results

No.23-1-0061401T004a-A6h

August 03, 2023

Test Standard(s) FCC 15.407

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Authorized

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NA # Message with SA scan ~

References

TC start	28.07.2023 10:56:38
Ambit temp [°C] humidity [rel%]	25.8 51
System version	4.6.0.1
Standard Version	NA NI
Method	
Description	Message with SA WLAN5Gx ax-HE80 U-NII-1
Information	PS46

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	28.07.2023 10:56:38
Message	set WLAN5Gx to WLAN5Gx ax-HE80 U-NII-1, Frequency [MHz] 5210 , Information: PS46

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70

Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-1

References

TC start	28.07.2023 10:56:48
Ambit temp [°C] humidity [rel%]	25.8 51
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-1
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5210
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5210 MHz

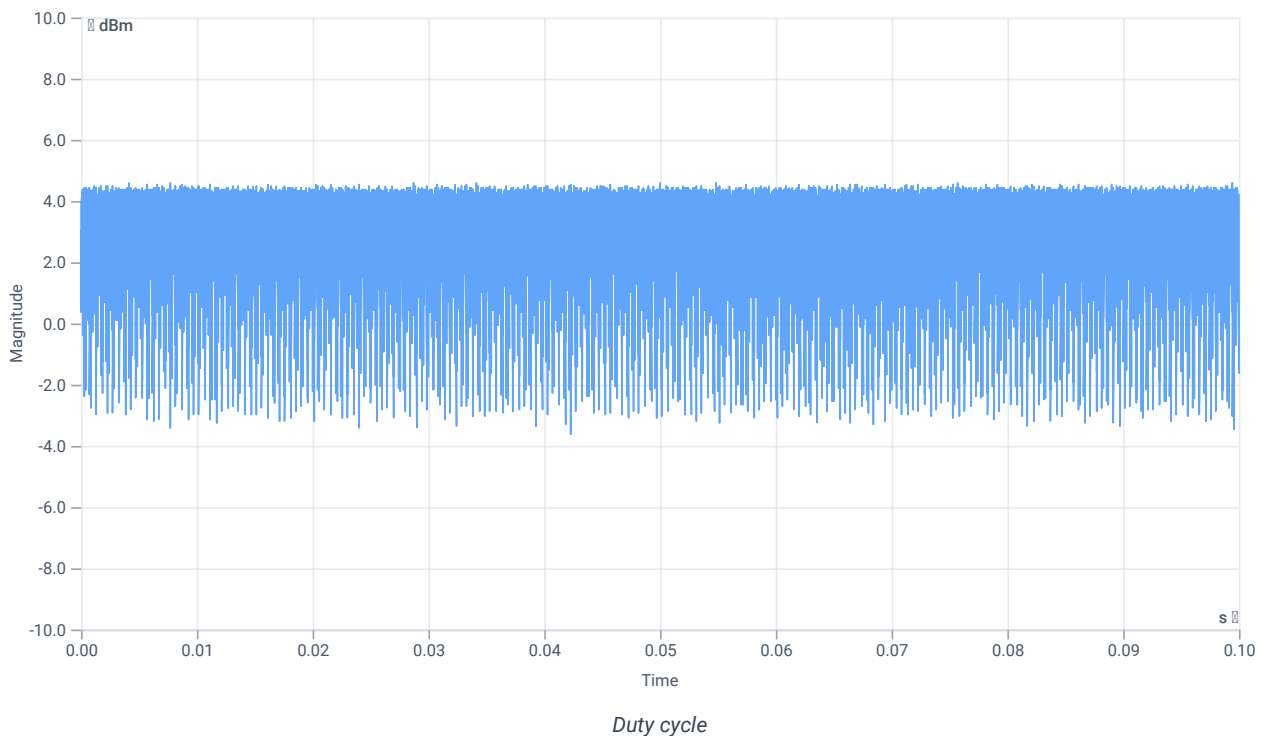
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.69	dBm	INFO
Ref. Frequency	--	--	5224.390	MHz	INFO

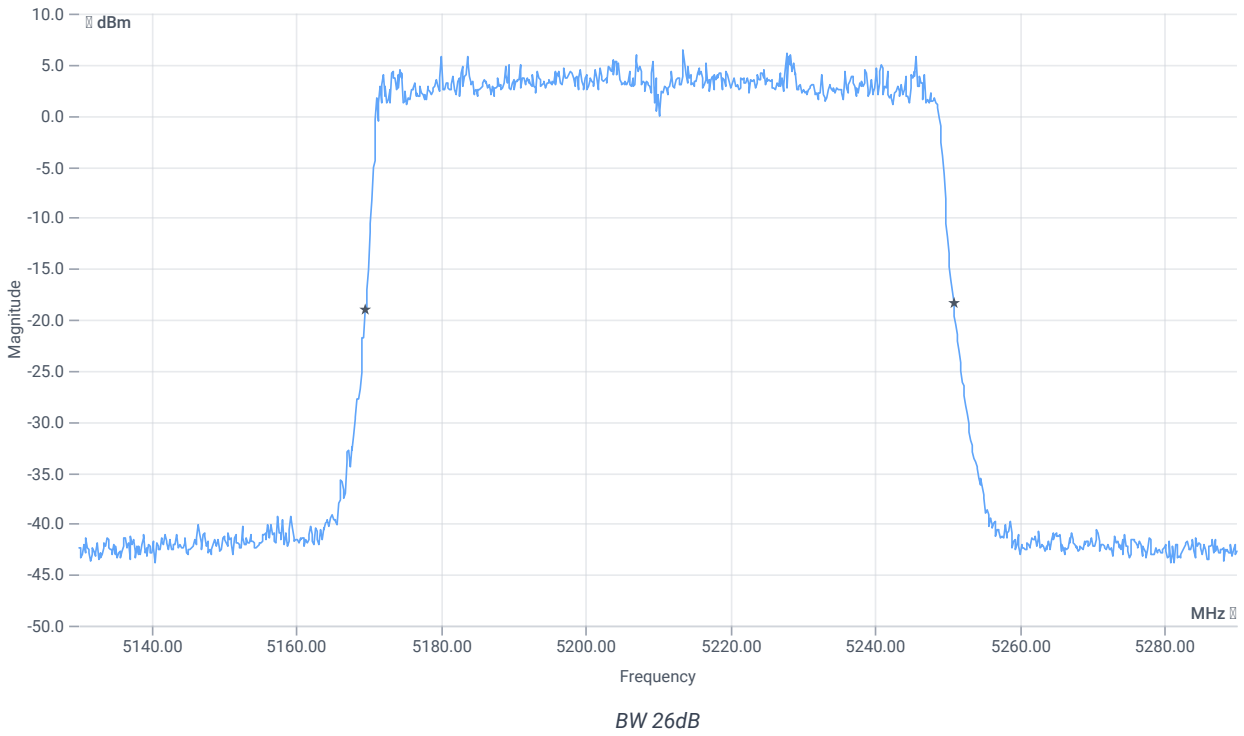
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



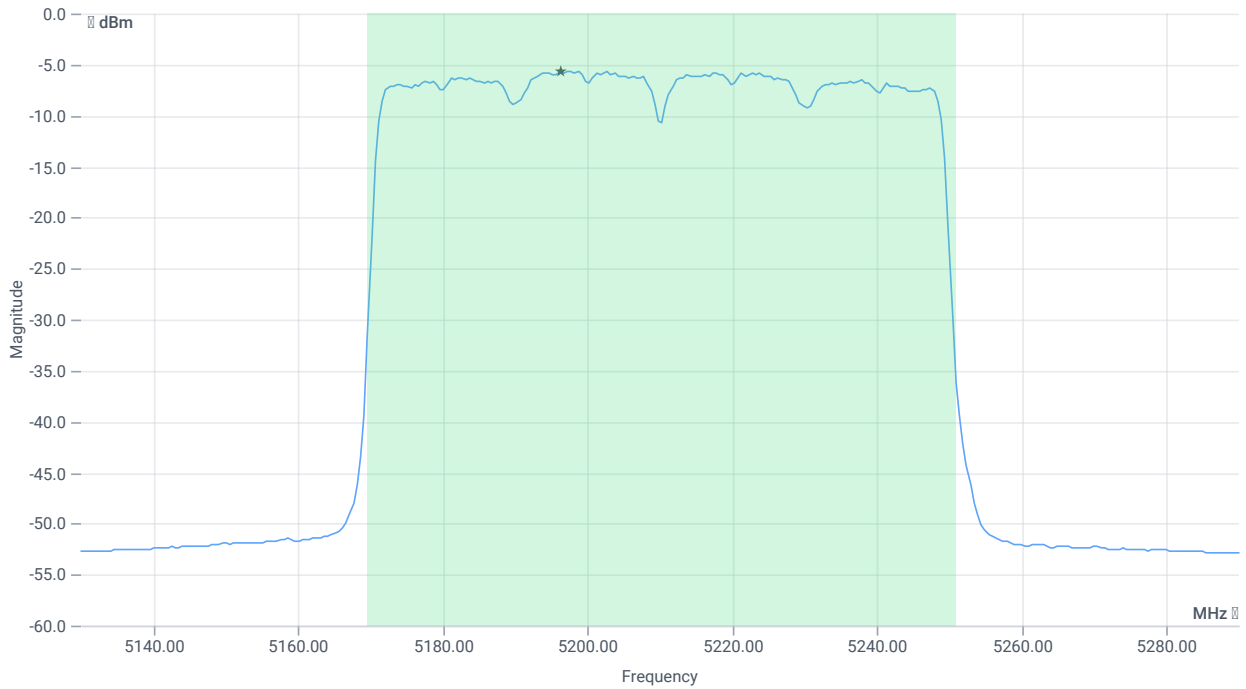
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.28	MHz	INFO
T1 26dB	---	---	5169.5200	MHz	INFO
T2 26dB	---	---	5250.8000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	15.69 16.3 15
Start [MHz] Stop [MHz]	5130.000 5290.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	11.85	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	11.85	dBm	PASS
Limit: 11 dBm + 10 log 81.28					
Max Output Power DC corrected	--	30.1	11.85	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-5.69	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-5.69	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-1

References

TC start	28.07.2023 10:59:19
Ambit temp [°C] humidity [rel%]	25.8 51
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-1
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5210
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

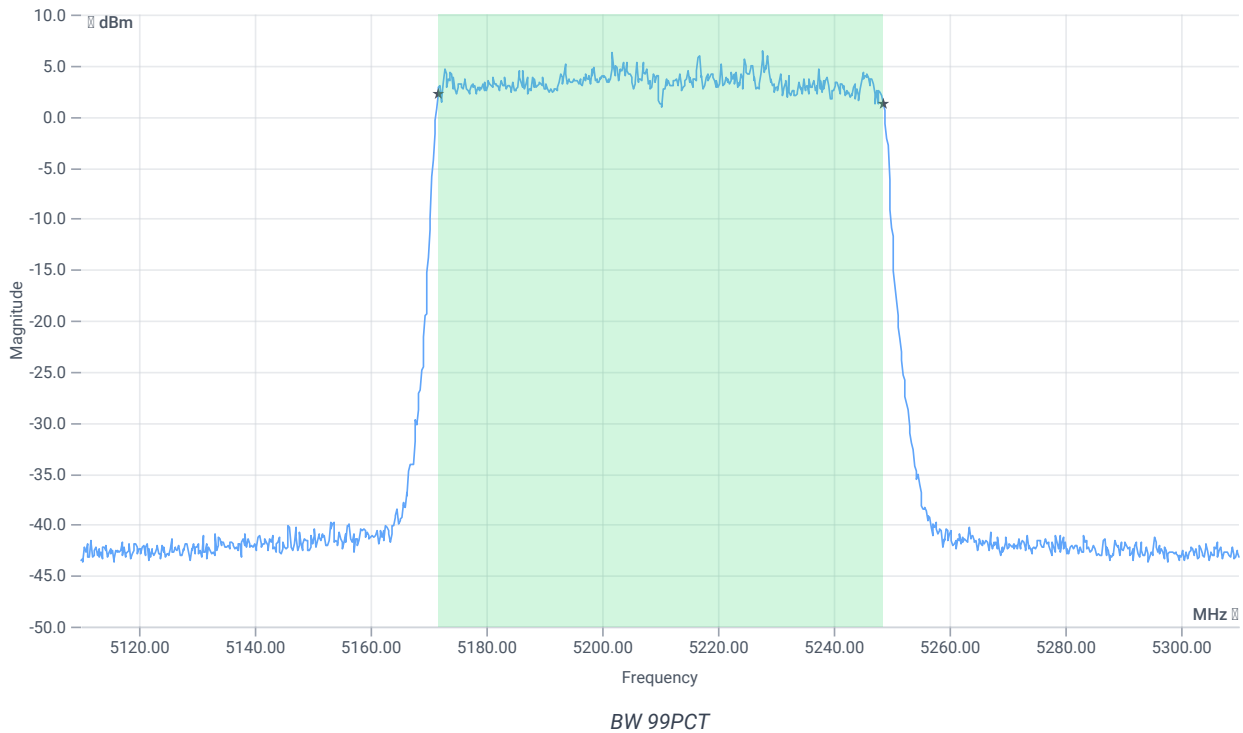
Test at TX 5210 MHz

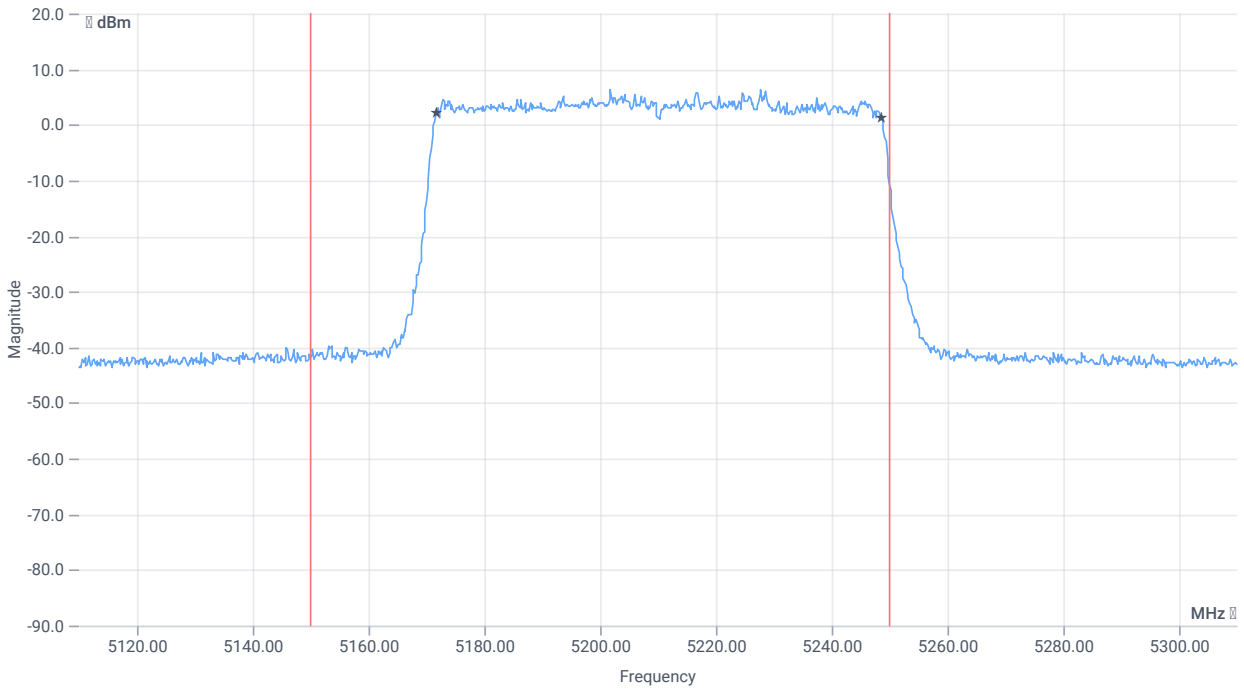
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.63	dBm	INFO
Ref. Frequency	--	--	5209.000	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	11.63 16.3 15
Start [MHz] Stop [MHz]	5110.000 5310.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

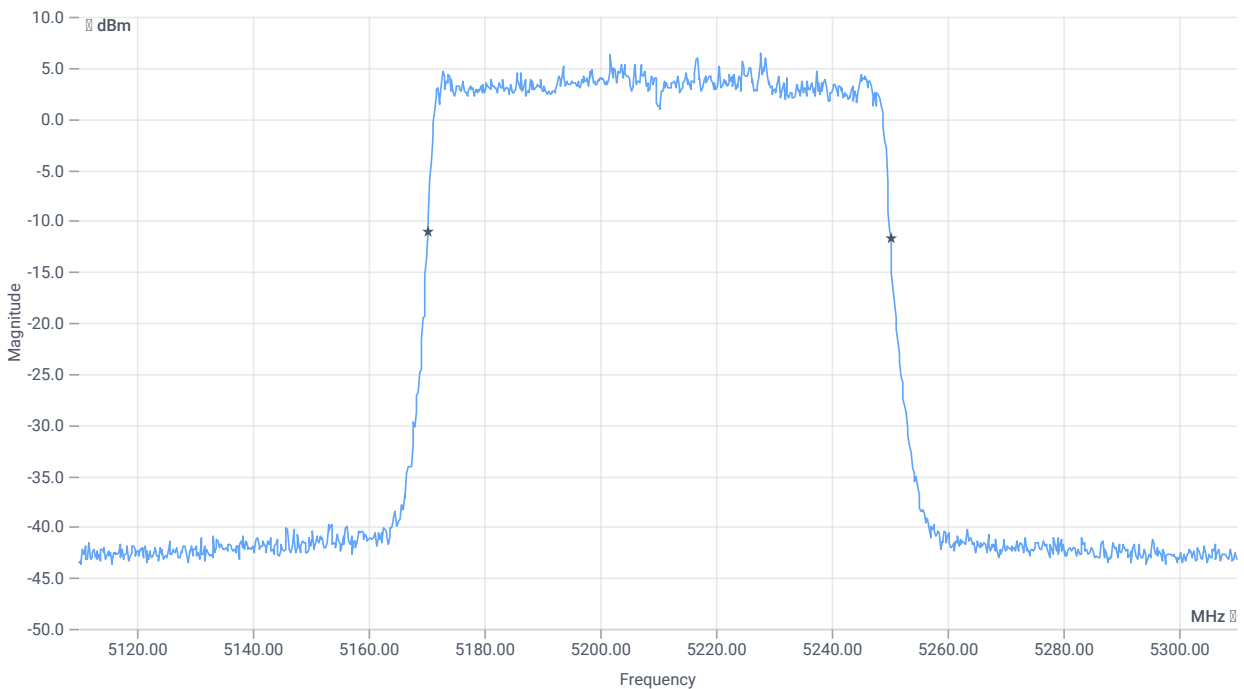




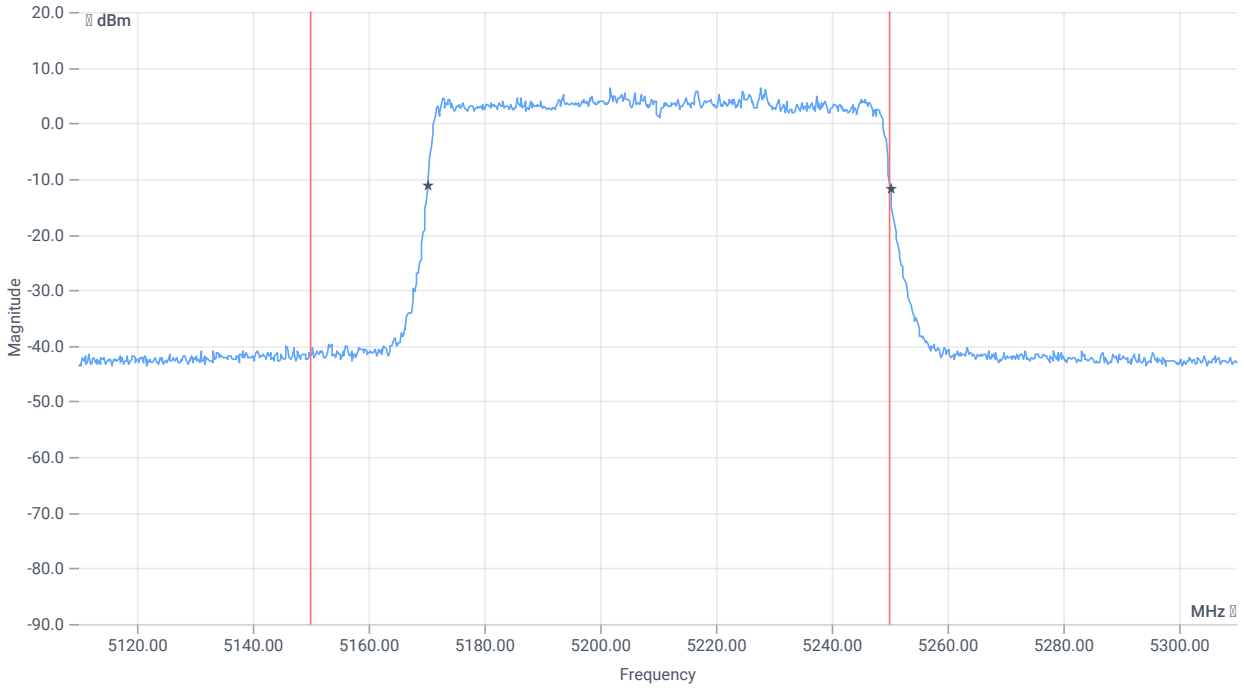
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	76.923	MHz	INFO
T1 99%	5150.000000	--	5171.6384	MHz	PASS
T2 99%	--	5250.000000	5248.5614	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	--	--	80	MHz	INFO
T1 20dB	5150.000000	--	5170.2000	MHz	PASS
T2 20dB	--	5250.000000	5250.2000	MHz	DFS required

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-1

References

TC start	28.07.2023 11:00:04
Ambit temp [°C] humidity [rel%]	25.8 51
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-1
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5210
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5210 MHz

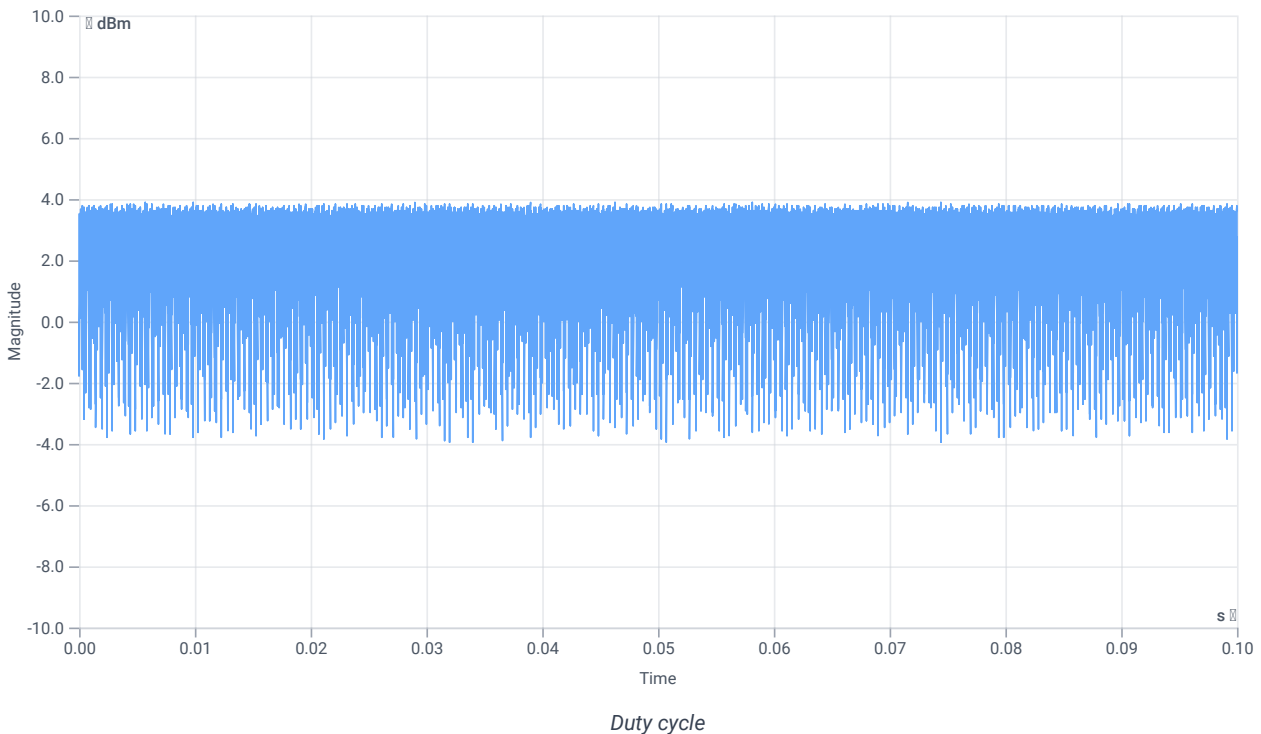
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.13	dBm	INFO
Ref. Frequency	--	--	5202.610	MHz	INFO

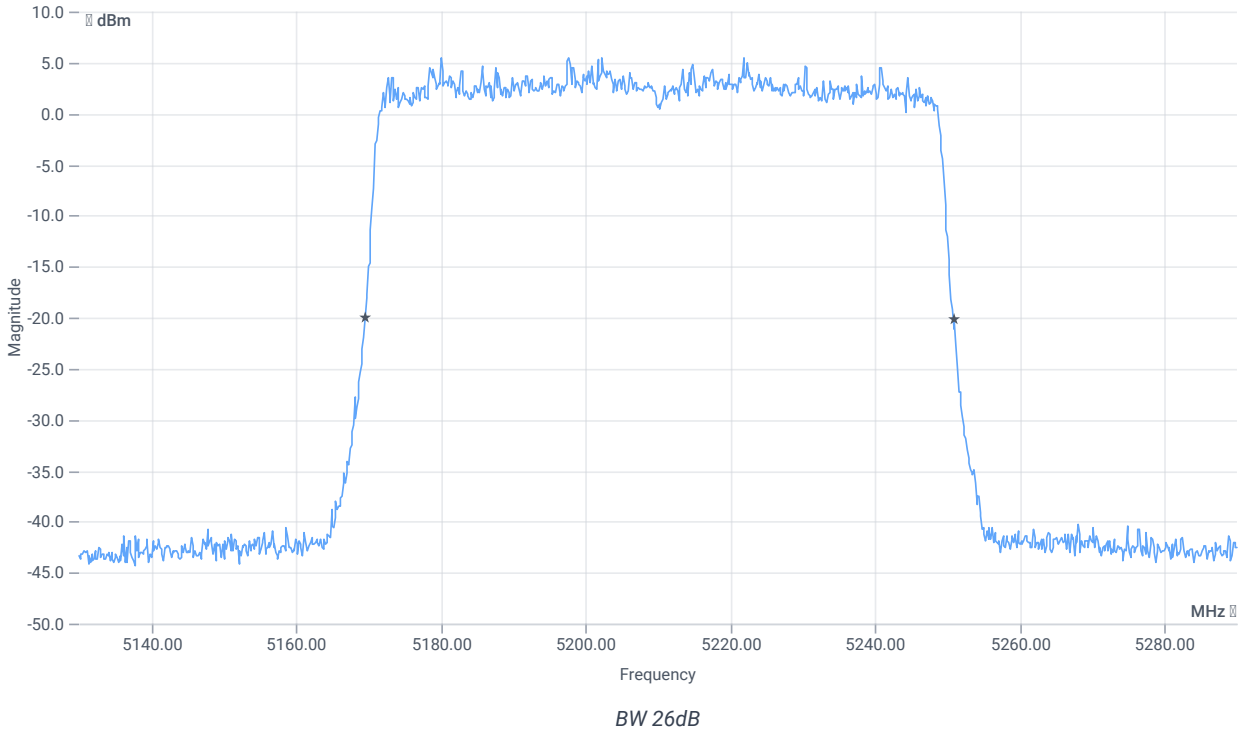
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



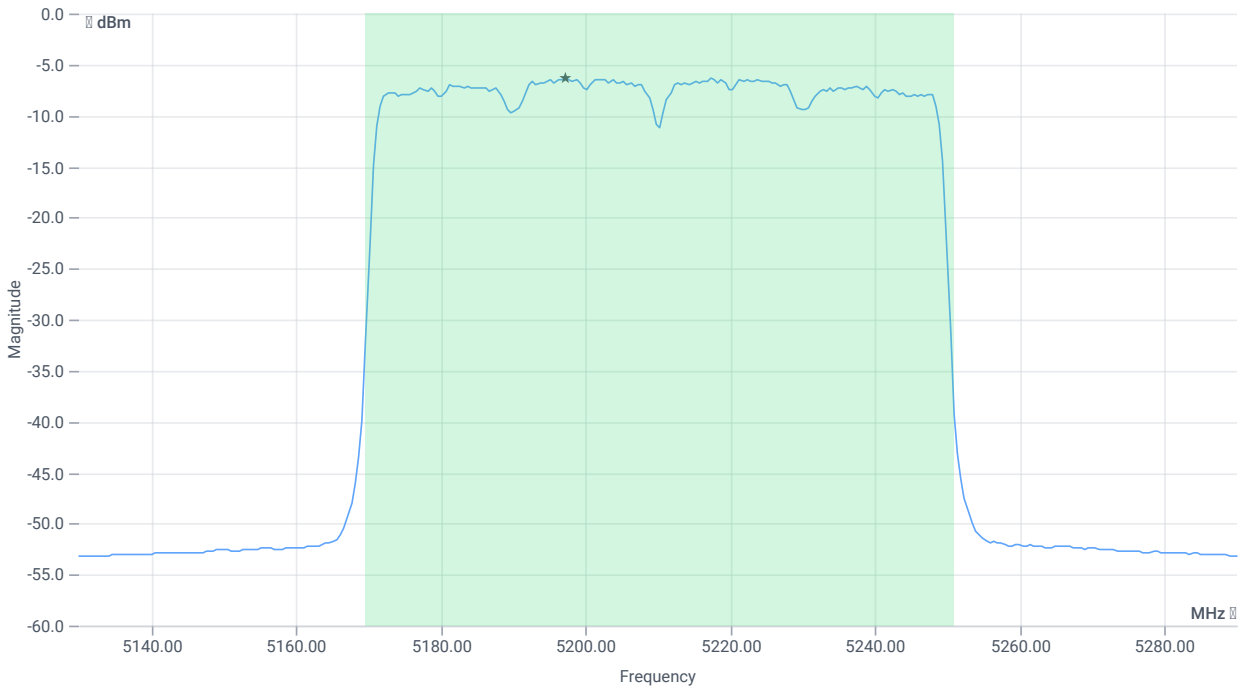
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.44	MHz	INFO
T1 26dB	---	---	5169.5200	MHz	INFO
T2 26dB	---	---	5250.9600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	15.13 16.3 15
Start [MHz] Stop [MHz]	5130.000 5290.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	11.23	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	11.23	dBm	PASS
Limit: 11 dBm + 10 log 81.44					
Max Output Power DC corrected	--	30.11	11.23	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-6.32	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-6.32	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-1

References

TC start	28.07.2023 11:02:35
Ambit temp [°C] humidity [rel%]	25.7 51
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-1
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5210
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

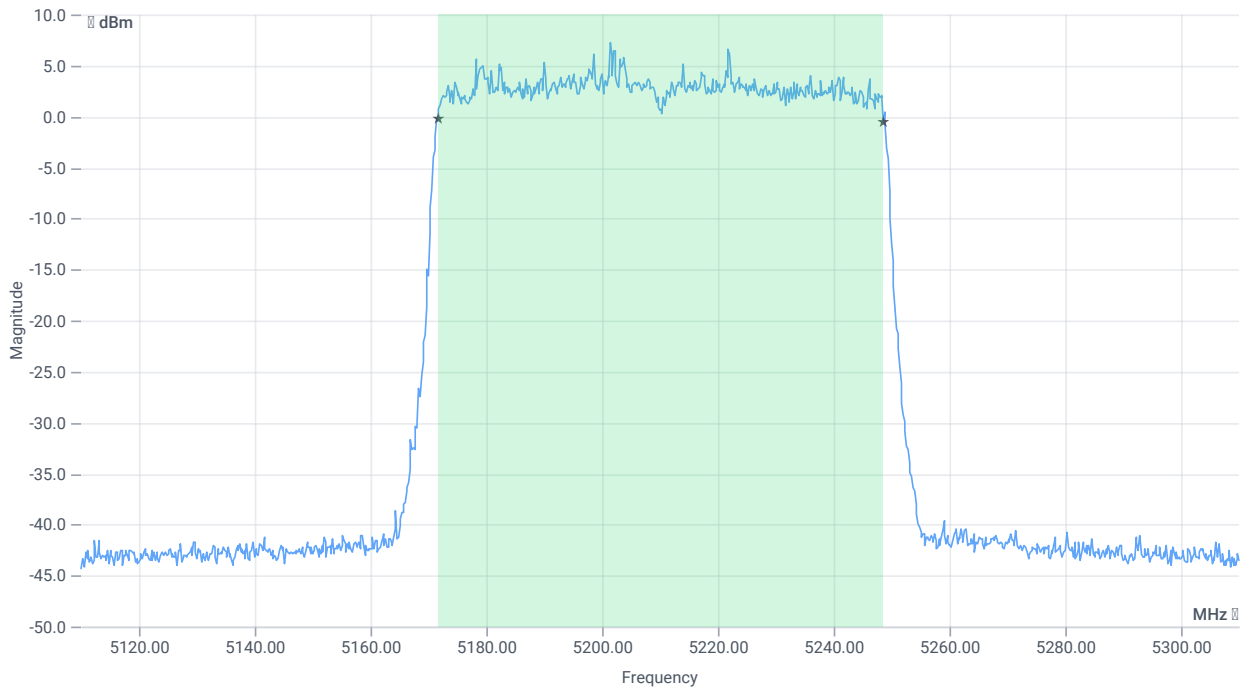
Test at TX 5210 MHz

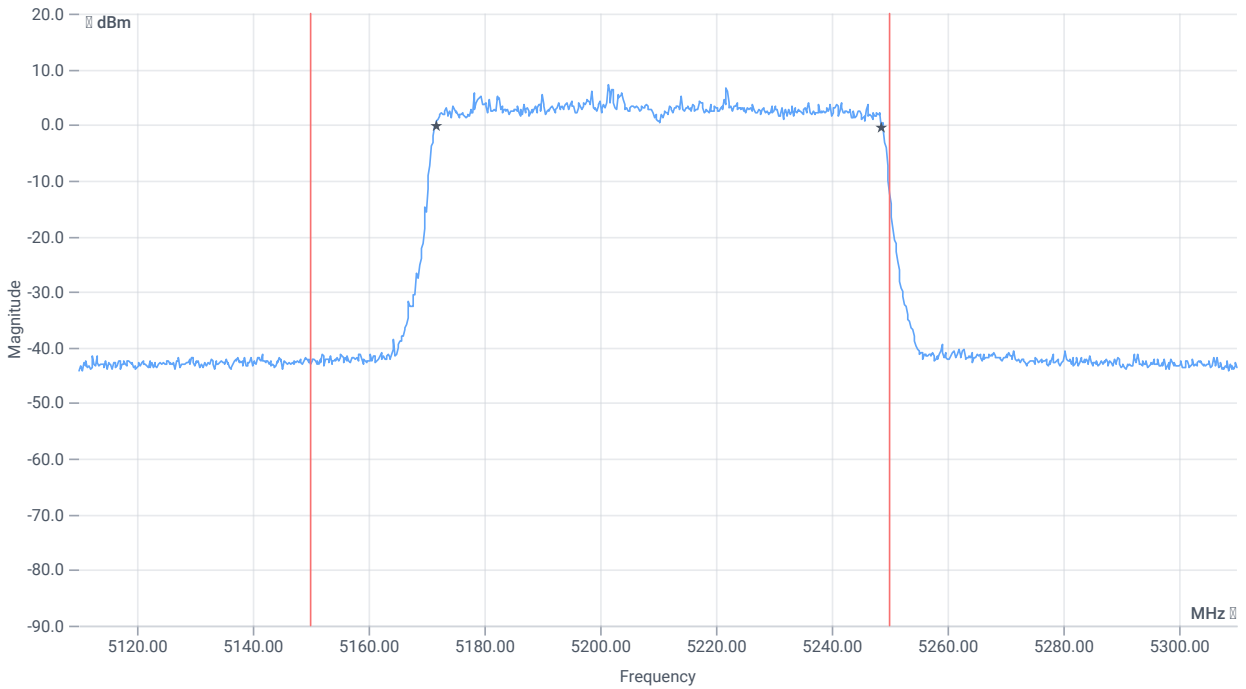
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	4.91	dBm	INFO
Ref. Frequency	--	--	5197.610	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	12.91 16.3 15
Start [MHz] Stop [MHz]	5110.000 5310.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

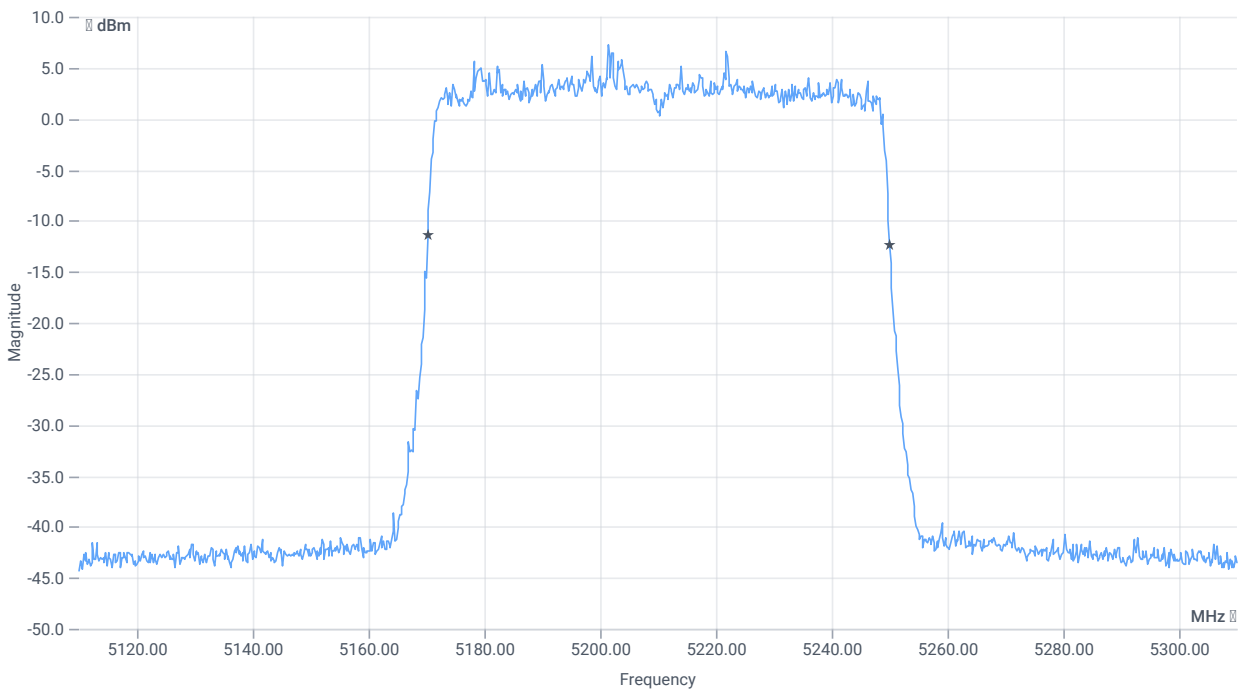




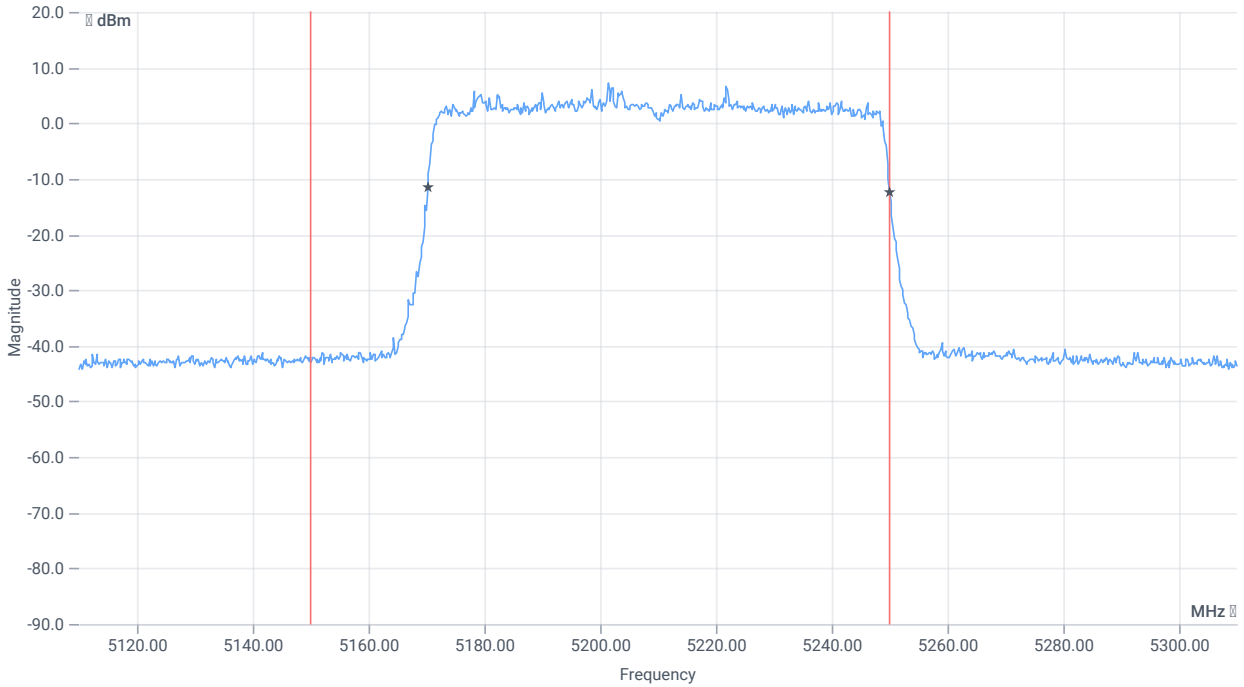
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	76.923	MHz	INFO
T1 99%	5150.000000	--	5171.6384	MHz	PASS
T2 99%	--	5250.000000	5248.5614	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	--	--	79.8	MHz	INFO
T1 20dB	5150.000000	--	5170.2000	MHz	PASS
T2 20dB	--	5250.000000	5250.0000	MHz	DFS required

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-1

References

TC start	28.07.2023 11:09:39
Ambit temp [°C] humidity [rel%]	25.5 52
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5210
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5210 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	11.85	dBm	INFO
Ant:1 BW 26dB	--	--	81.280	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	11.23	dBm	INFO
Ant:2 BW 26dB	--	--	81.440	MHz	INFO
Σ Limit absolute	--	24	14.56	dBm	PASS
Σ Limit: 11 dBm + 10 log 81.28	--	30.1	14.56	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	-5.69	dBm/1MHz	INFO
Ant:2 PSD	--	--	-6.32	dBm/1MHz	INFO
Σ	--	11	-2.98	dBm/1MHz	PASS

Verdict

PASS

NA # Message with SA scan ~

References

TC start	28.07.2023 11:20:50
Ambit temp [°C] humidity [rel%]	25.4 53
System version	4.6.0.1
Standard Version	NA NI
Method	
Description	Message with SA Scan ax-HE80 U-NII-2A
Information	PS46

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	28.07.2023 11:20:50
Message	set WLAN5Gx to ax-HE80 U-NII-2A, Frequency [MHz] 5290 , Information: PS82

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2A

References

TC start	28.07.2023 11:21:04
Ambit temp [°C] humidity [rel%]	25.4 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2A
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5290
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5290 MHz

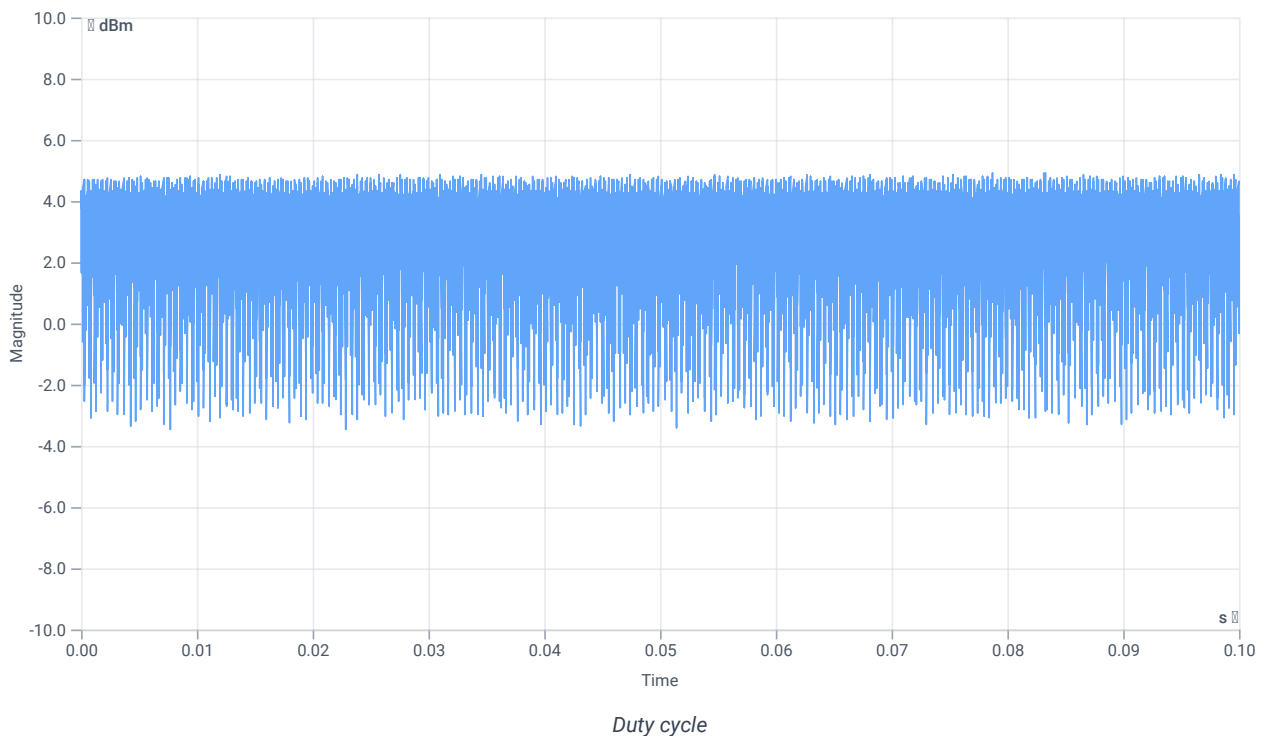
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	4.77	dBm	INFO
Ref. Frequency	--	--	5284.010	MHz	INFO

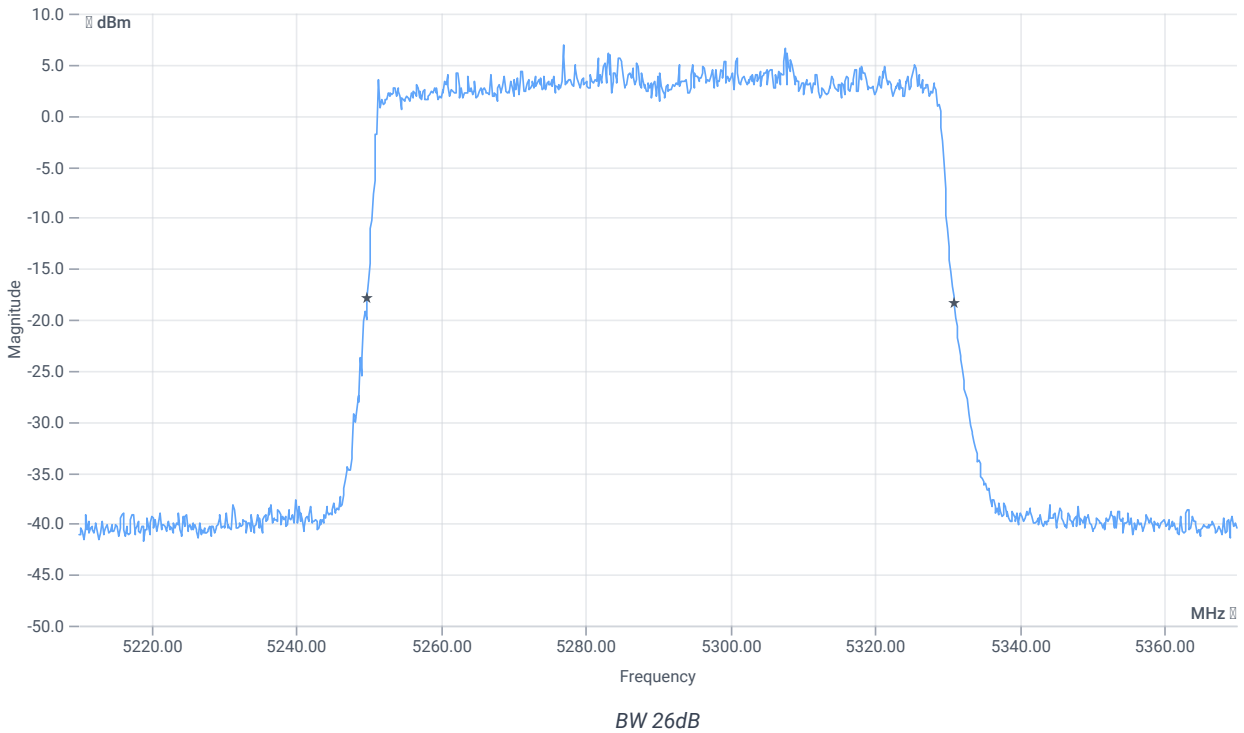
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



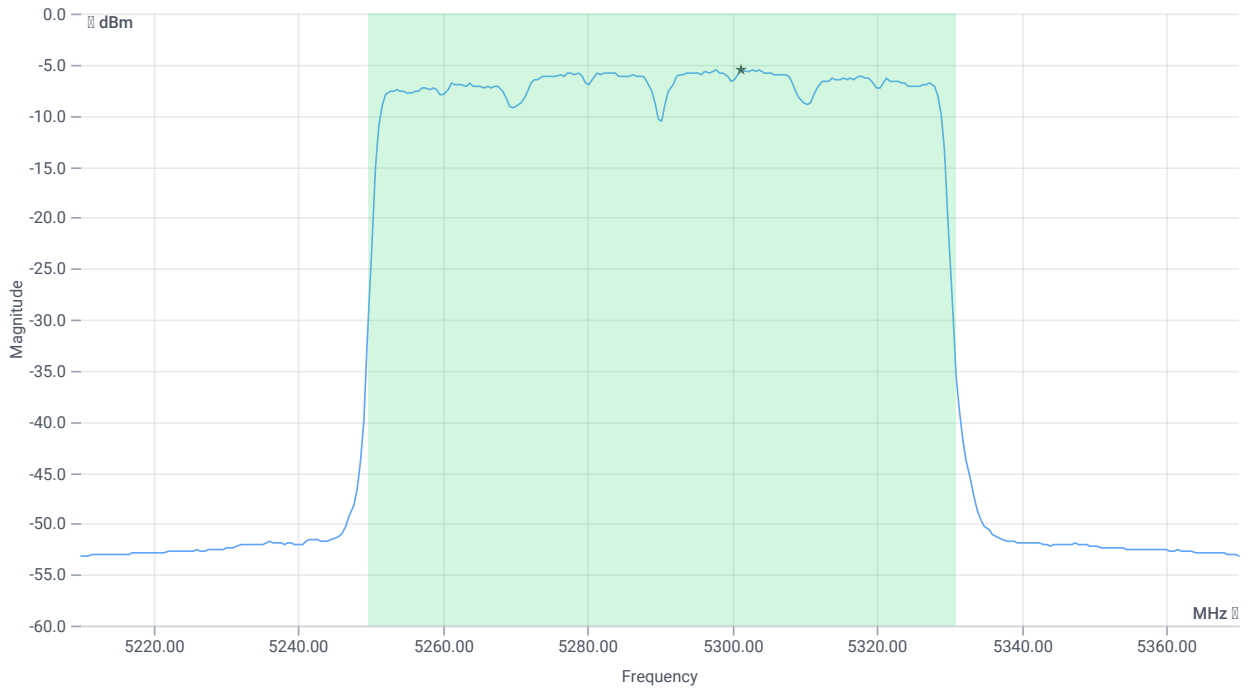
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.12	MHz	INFO
T1 26dB	---	---	5249.8400	MHz	INFO
T2 26dB	---	---	5330.9600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	16.77 16.1 15
Start [MHz] Stop [MHz]	5210.000 5370.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	11.9	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	11.9	dBm	PASS
Limit: 11 dBm + 10 log 81.12					
Max Output Power DC corrected	--	30.09	11.9	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-5.5	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-5.5	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2A

References

TC start	28.07.2023 11:23:38
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2A
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5290
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

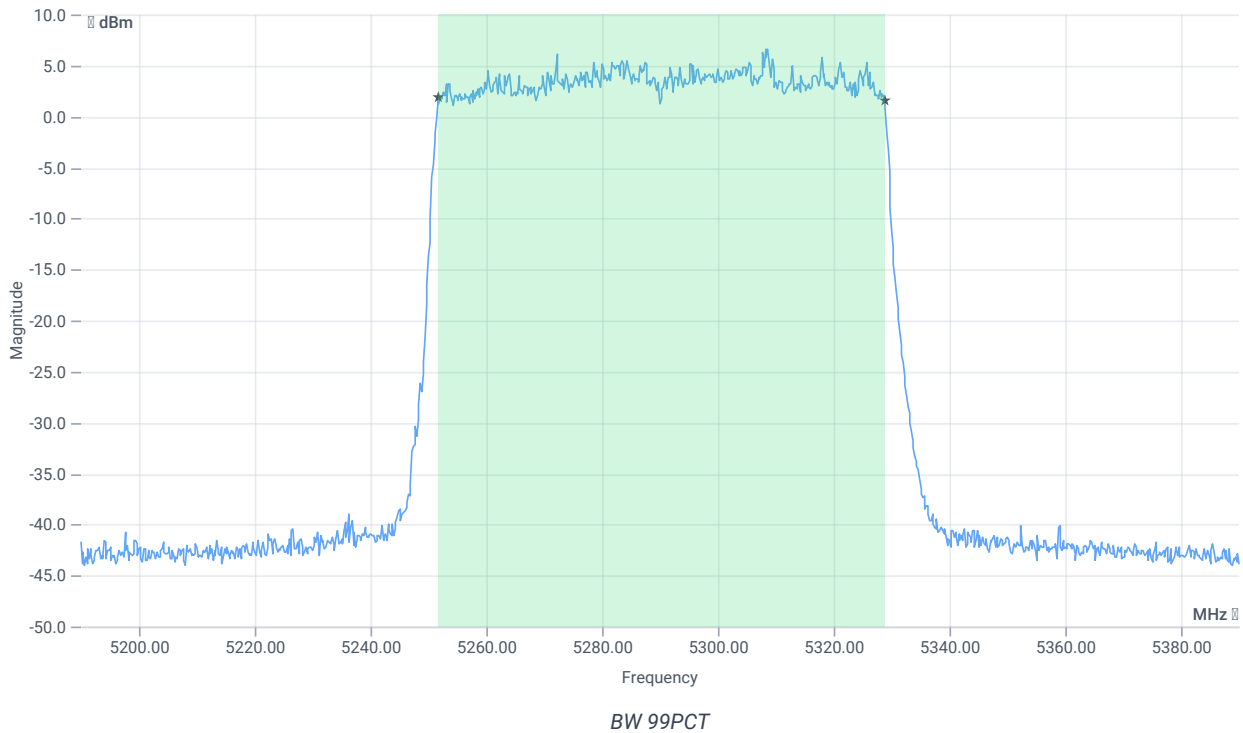
Test at TX 5290 MHz

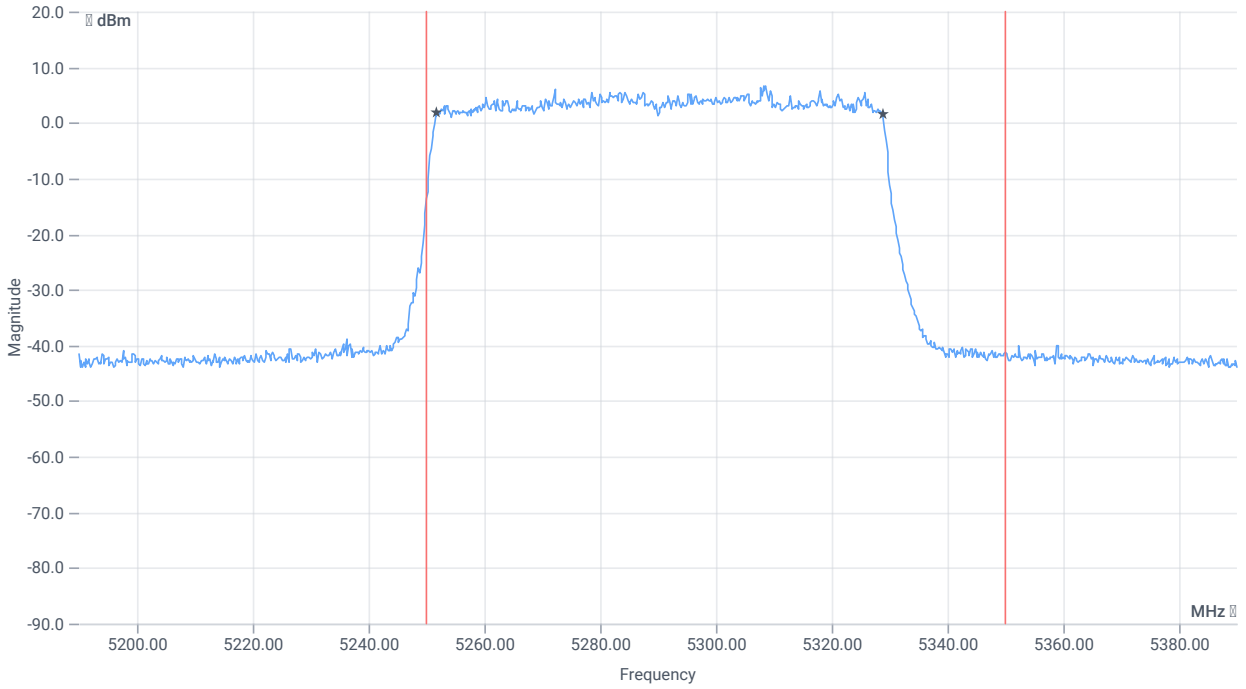
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	4.84	dBm	INFO
Ref. Frequency	--	--	5325.960	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	12.84 16.1 15
Start [MHz] Stop [MHz]	5190.000 5390.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

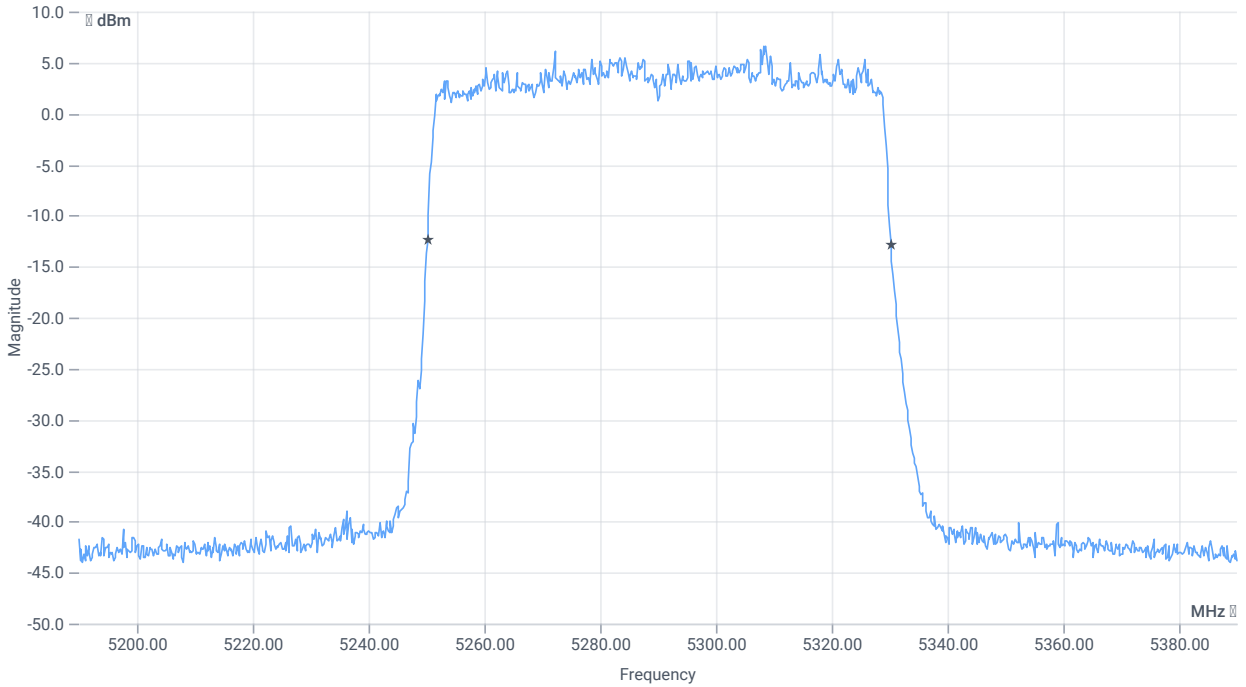




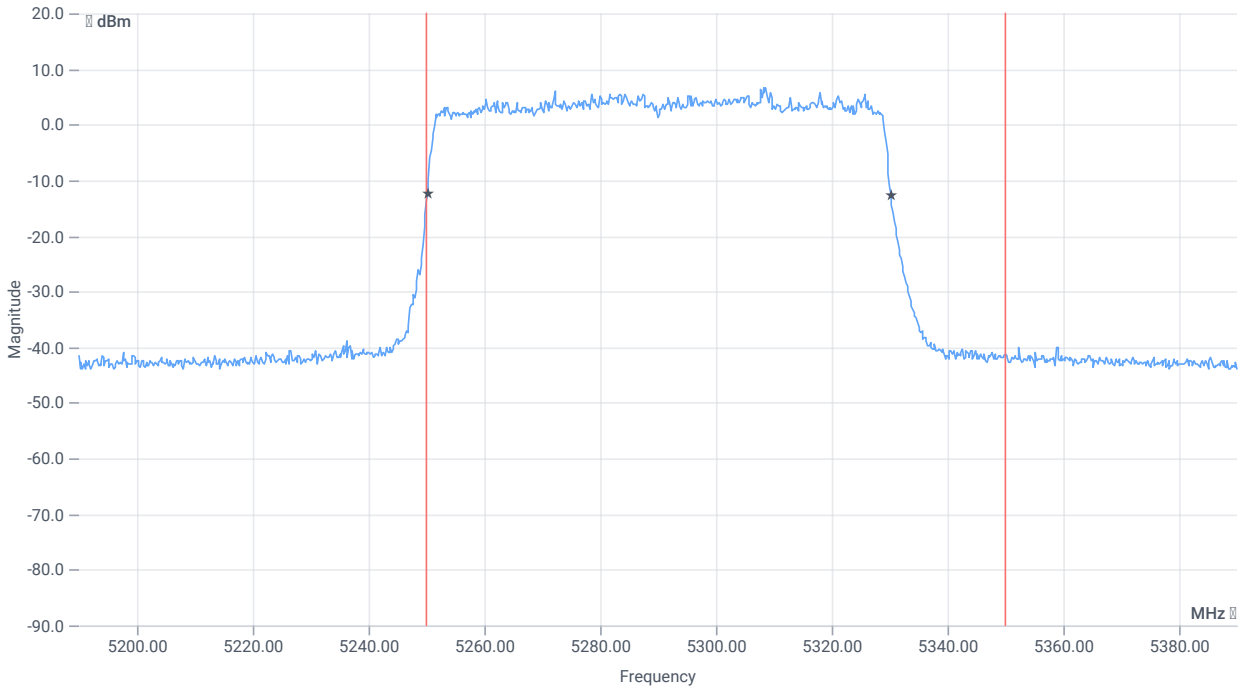
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.123	MHz	INFO
T1 99%	5250.000000	--	5251.6384	MHz	PASS since U-NII-1 is supported
T2 99%	--	5350.000000	5328.7612	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5250.000000	--	5250.2000	MHz	PASS since U-NII-1 is supported
T2 20dB	--	5350.000000	5330.2000	MHz	PASS

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2A

References

TC start	28.07.2023 11:24:18
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2A
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5290
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5290 MHz

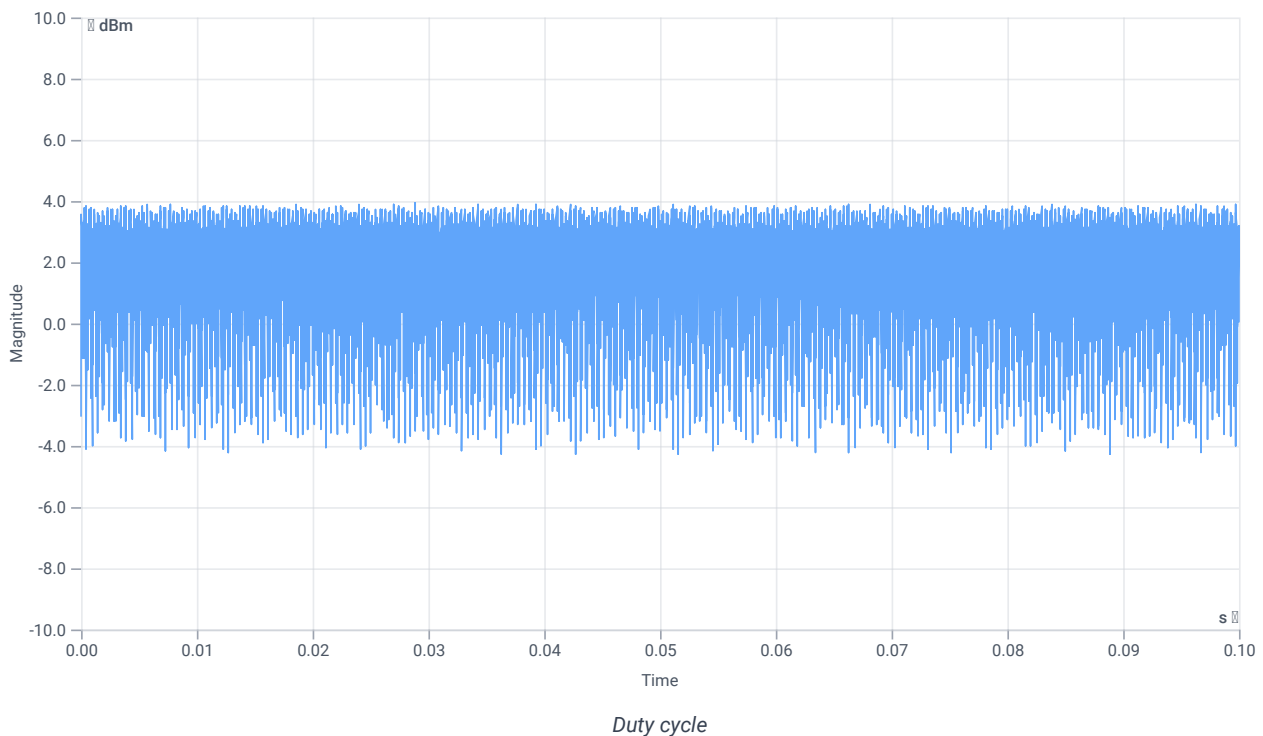
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.66	dBm	INFO
Ref. Frequency	--	--	5301.790	MHz	INFO

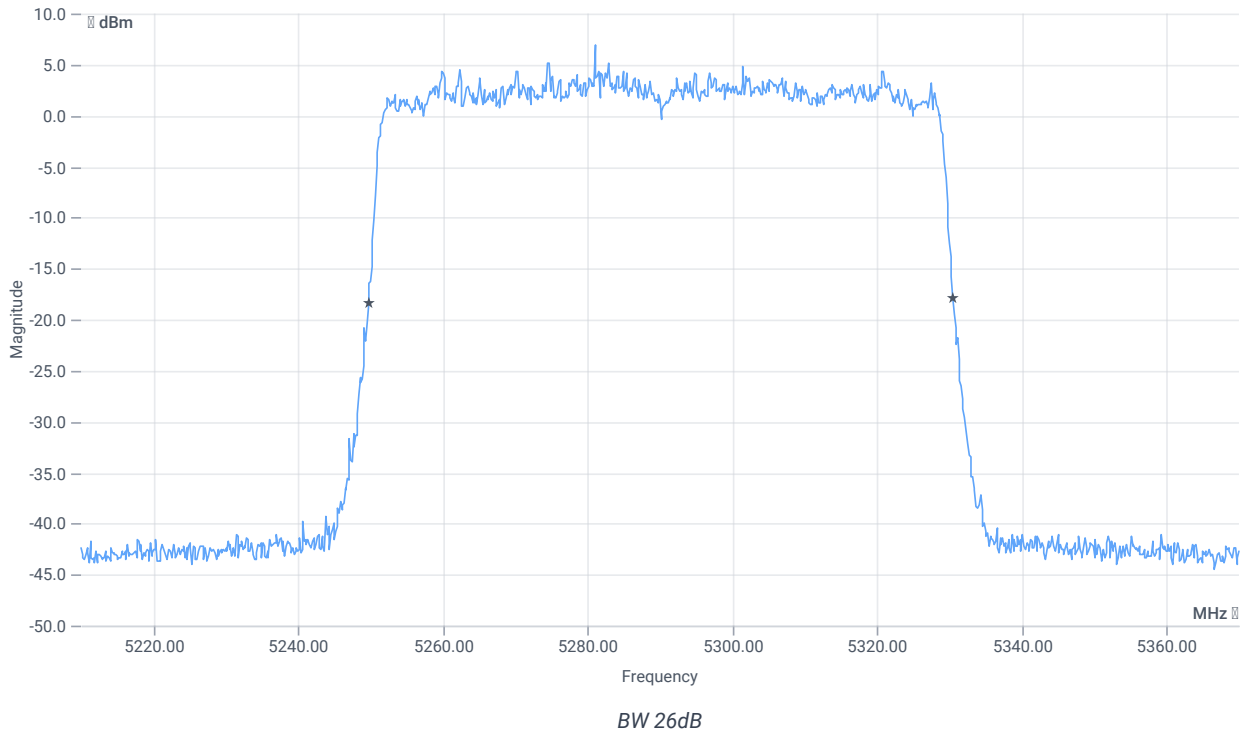
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



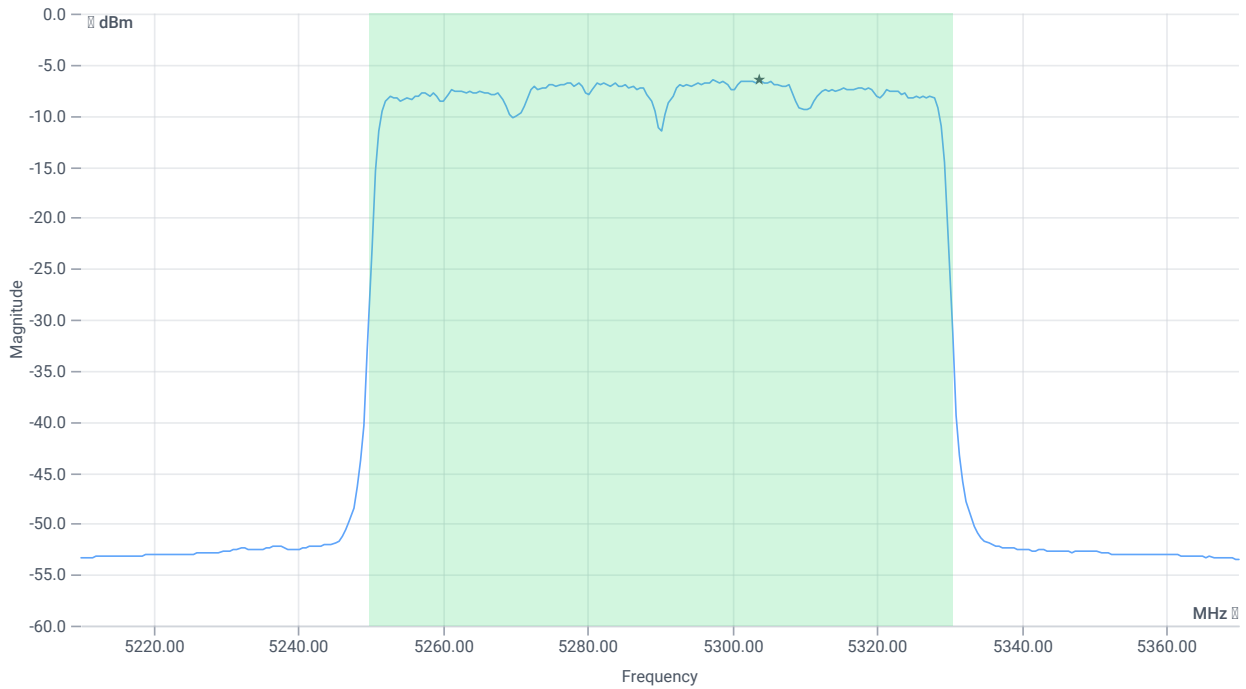
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	80.8	MHz	INFO
T1 26dB	---	---	5249.6800	MHz	INFO
T2 26dB	---	---	5330.4800	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	15.66 16.1 15
Start [MHz] Stop [MHz]	5210.000 5370.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	10.97	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	10.97	dBm	PASS
Limit: 11 dBm + 10 log 80.8					
Max Output Power DC corrected	--	30.07	10.97	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-6.54	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-6.54	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2A

References

TC start	28.07.2023 11:26:50
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2A
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5290
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

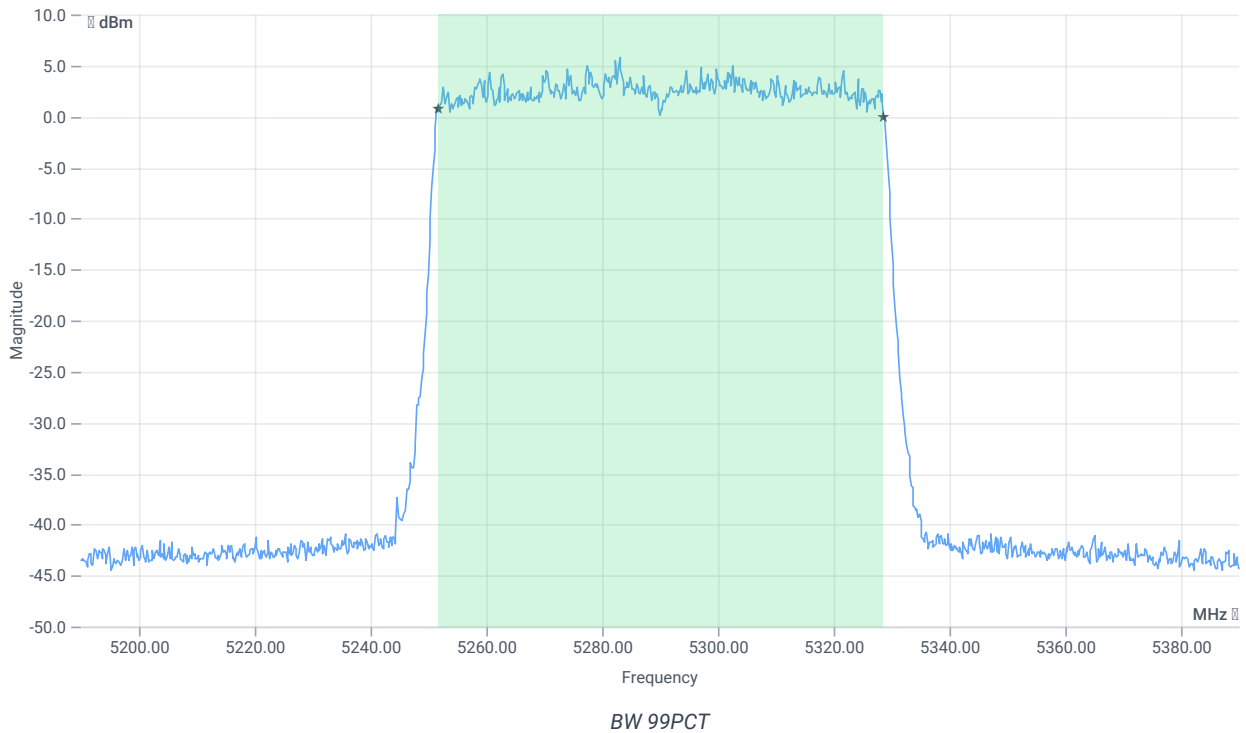
Test at TX 5290 MHz

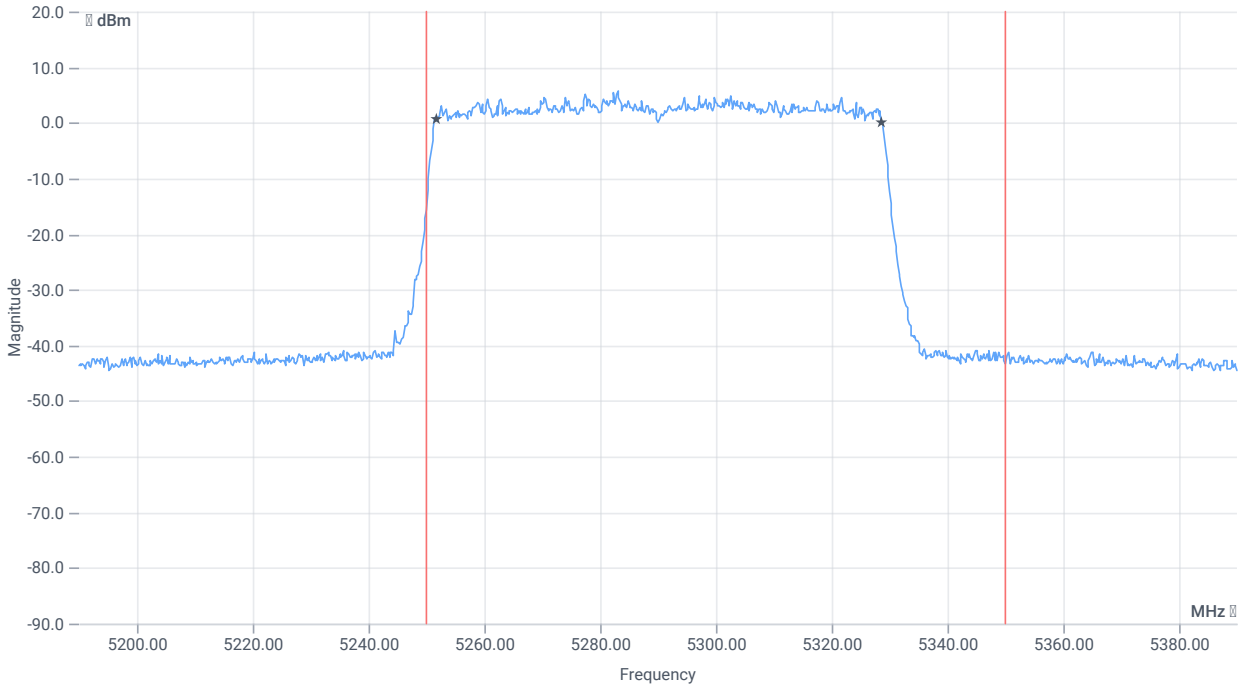
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.78	dBm	INFO
Ref. Frequency	--	--	5277.610	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	11.78 16.1 15
Start [MHz] Stop [MHz]	5190.000 5390.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

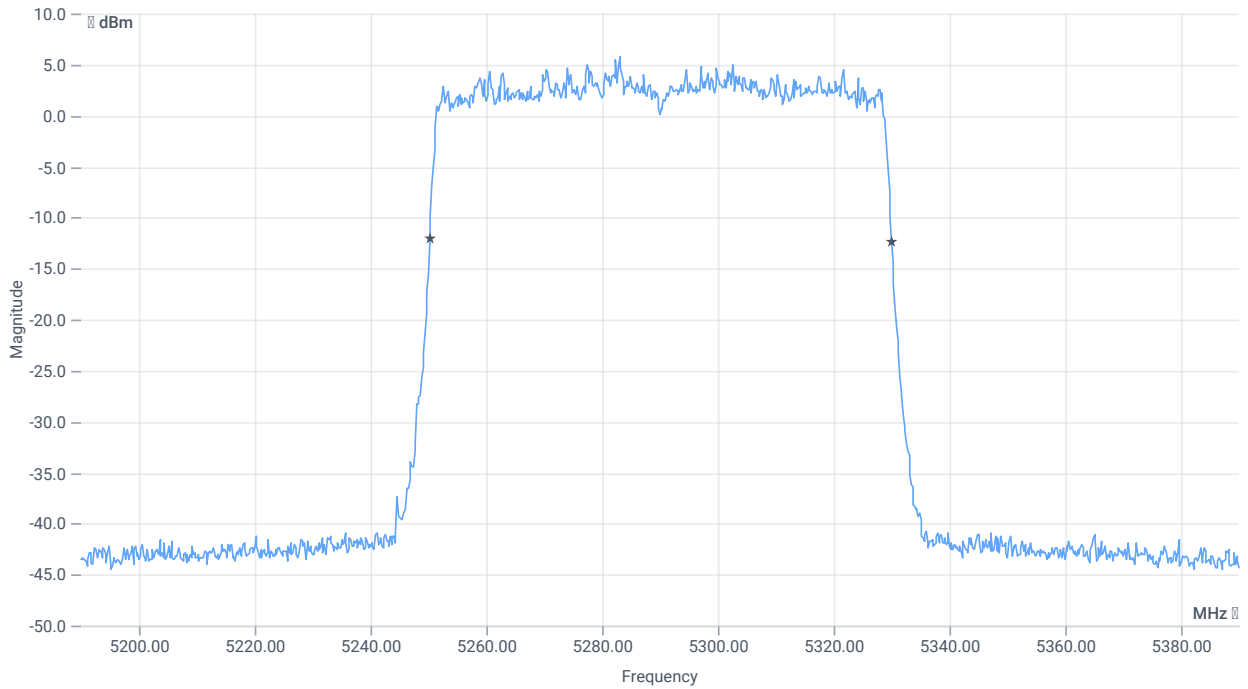




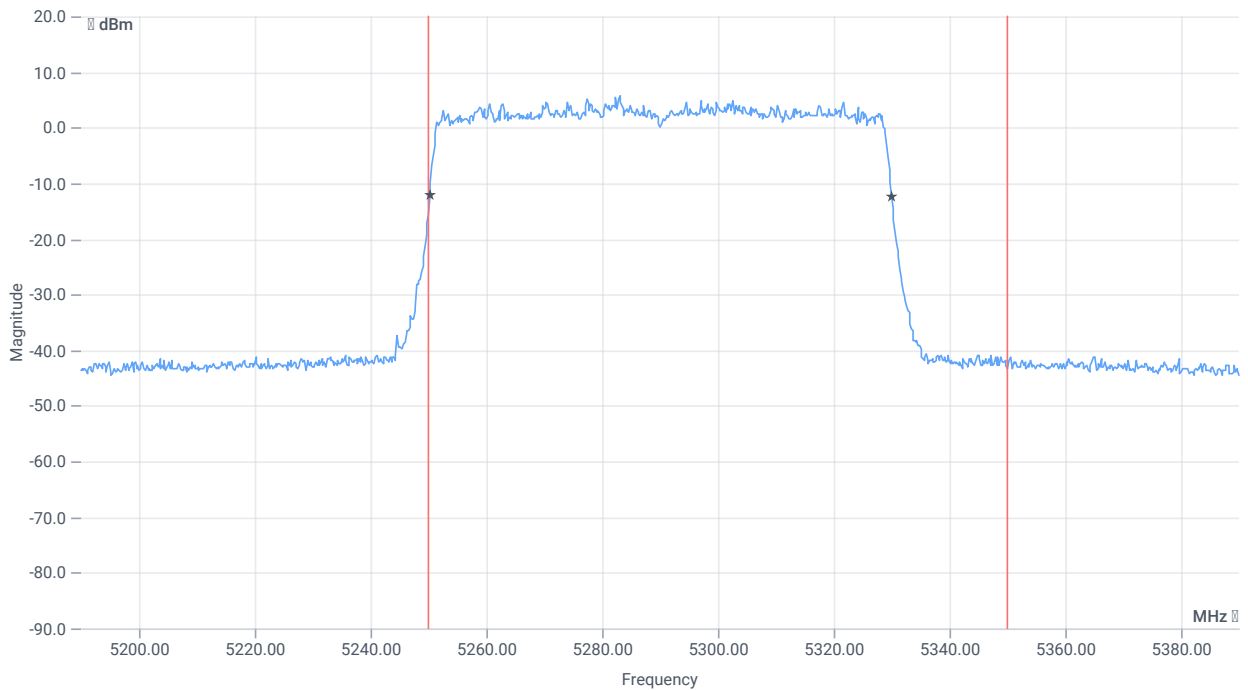
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	76.923	MHz	INFO
T1 99%	5250.000000	--	5251.6384	MHz	PASS since U-NII-1 is supported
T2 99%	--	5350.000000	5328.5614	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	79.8	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5250.000000	--	5250.2000	MHz	PASS since U-NII-1 is supported
T2 20dB	--	5350.000000	5330.0000	MHz	PASS

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2A

References

TC start	28.07.2023 11:27:30
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-2A
Information	PS46

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5290
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5290 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	11.9	dBm	INFO
Ant:1 BW 26dB	--	--	81.120	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	10.97	dBm	INFO
Ant:2 BW 26dB	--	--	80.800	MHz	INFO
Σ Limit absolute	--	24	14.47	dBm	PASS
Σ Limit: 11 dBm + 10 log 80.8	--	30.07	14.47	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	-5.5	dBm/1MHz	INFO
Ant:2 PSD	--	--	-6.54	dBm/1MHz	INFO
Σ	--	11	-2.98	dBm/1MHz	PASS

Verdict

PASS

NA # Message with SA scan ~

References

TC start	28.07.2023 11:32:24
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	NA NI
Method	
Description	Message with SA Scan ax_HE80_U_NII_2C
Information	PS48

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	28.07.2023 11:32:24
Message	set WLAN5Gx to ax_HE80_U_NII_2C, Frequency [MHz] 5530 , Information: PS48

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:32:39
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS48

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5530 MHz

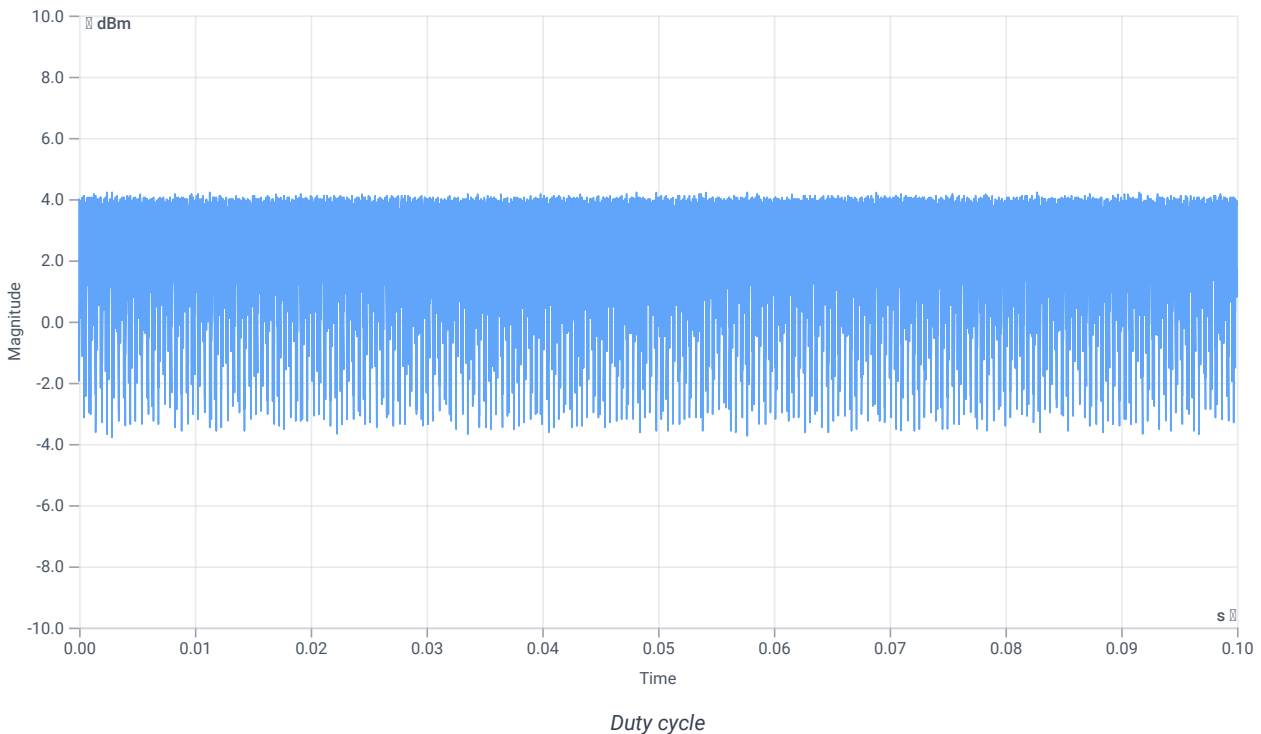
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	4.30	dBm	INFO
Ref. Frequency	--	--	5557.970	MHz	INFO

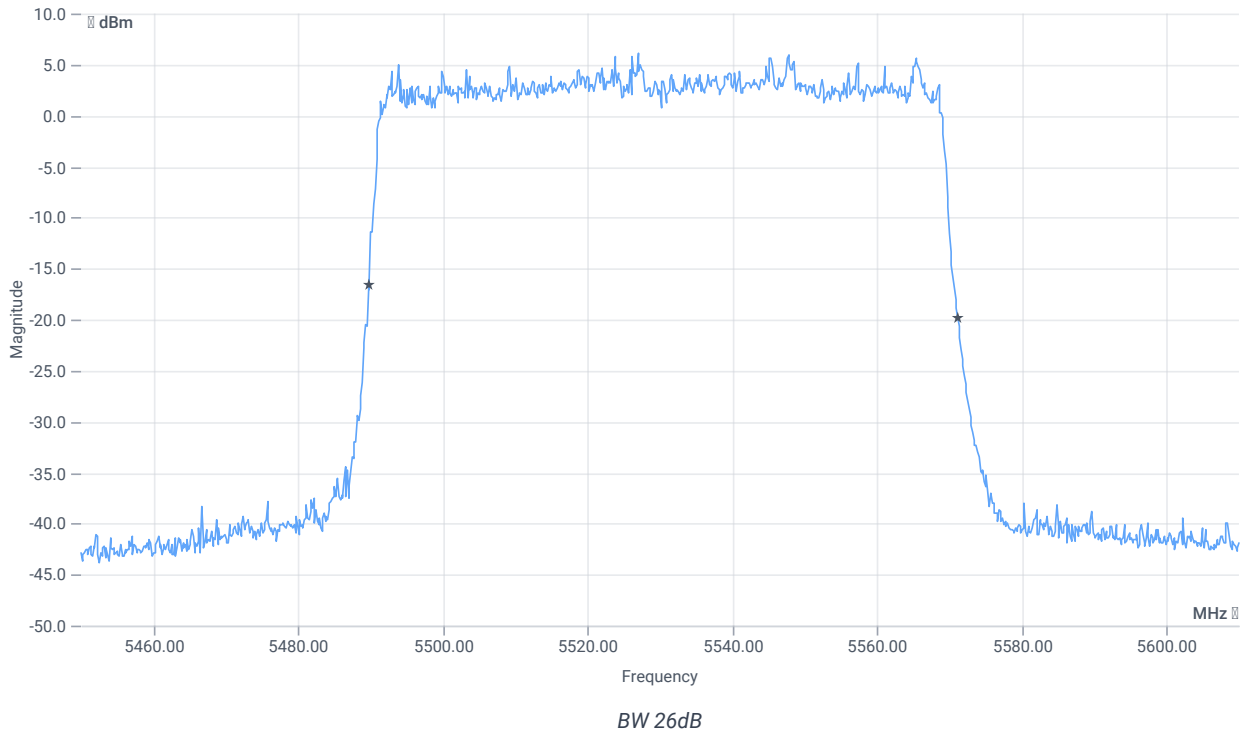
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



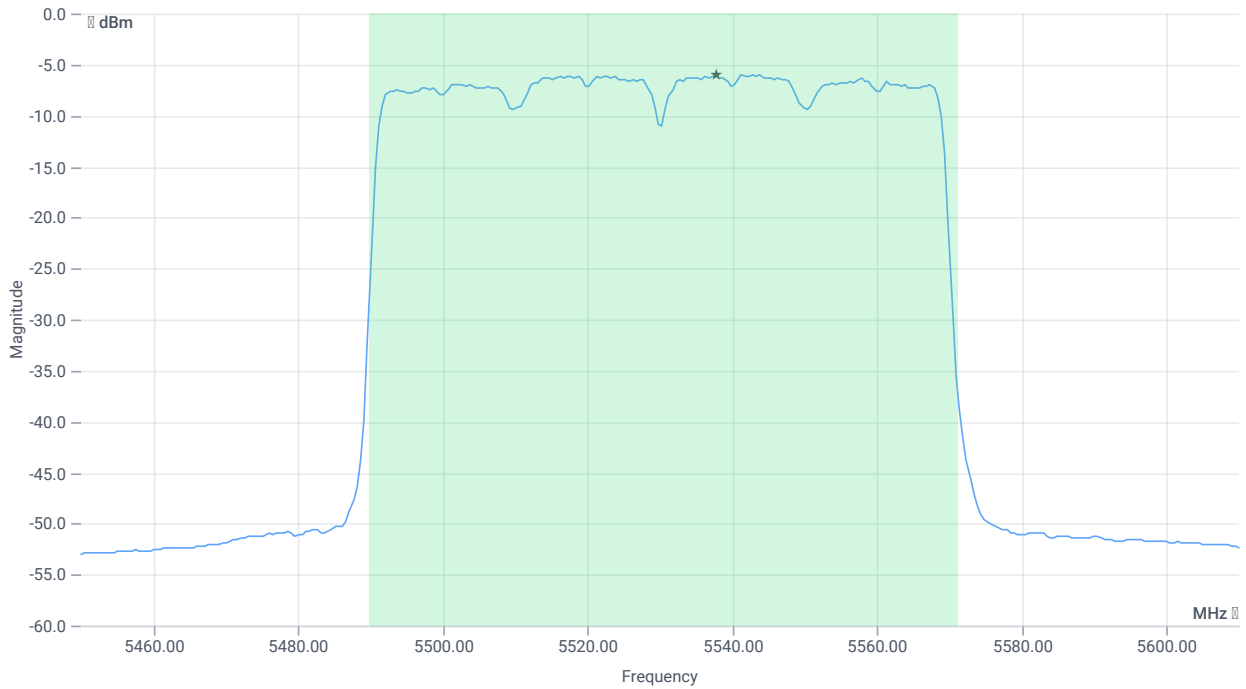
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.44	MHz	INFO
T1 26dB	---	---	5489.6800	MHz	INFO
T2 26dB	---	---	5571.1200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	16.30 16.77 15
Start [MHz] Stop [MHz]	5450.000 5610.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	11.59	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	11.59	dBm	PASS
Limit: 11 dBm + 10 log 81.44					
Max Output Power DC corrected	--	30.11	11.59	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-6.02	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-6.02	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:35:10
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS48

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

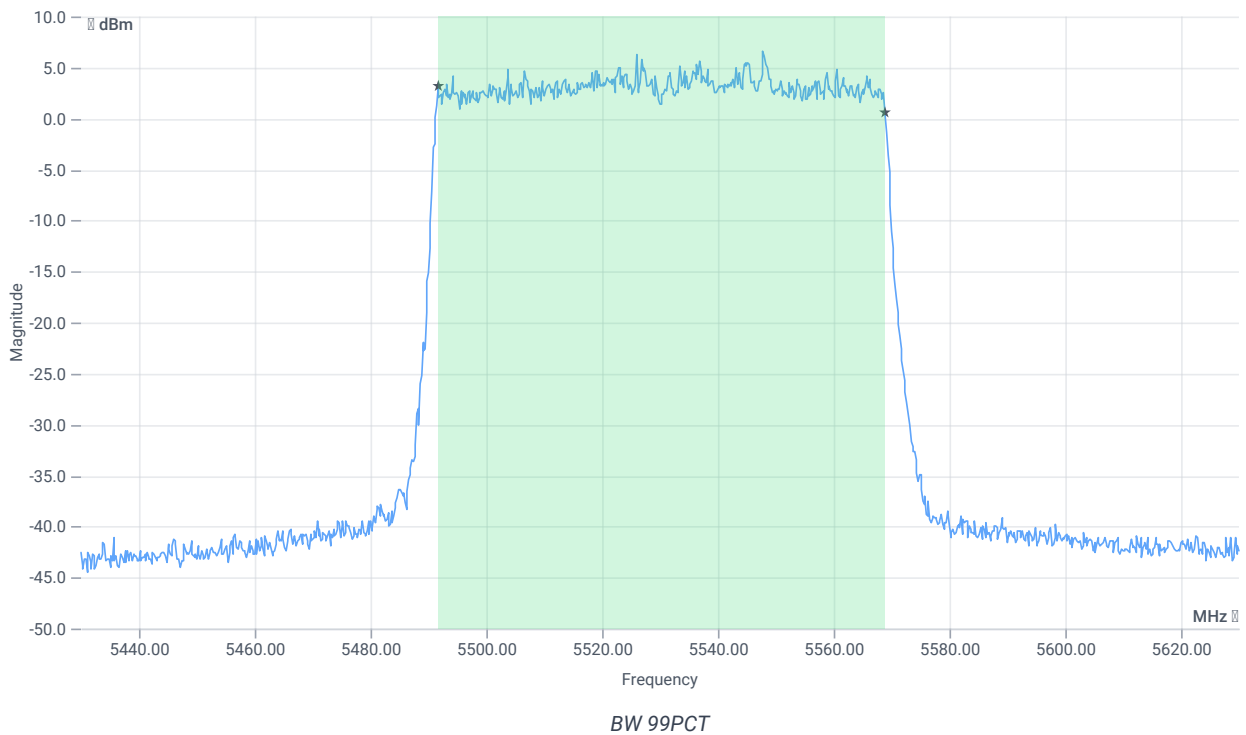
Test at TX 5530 MHz

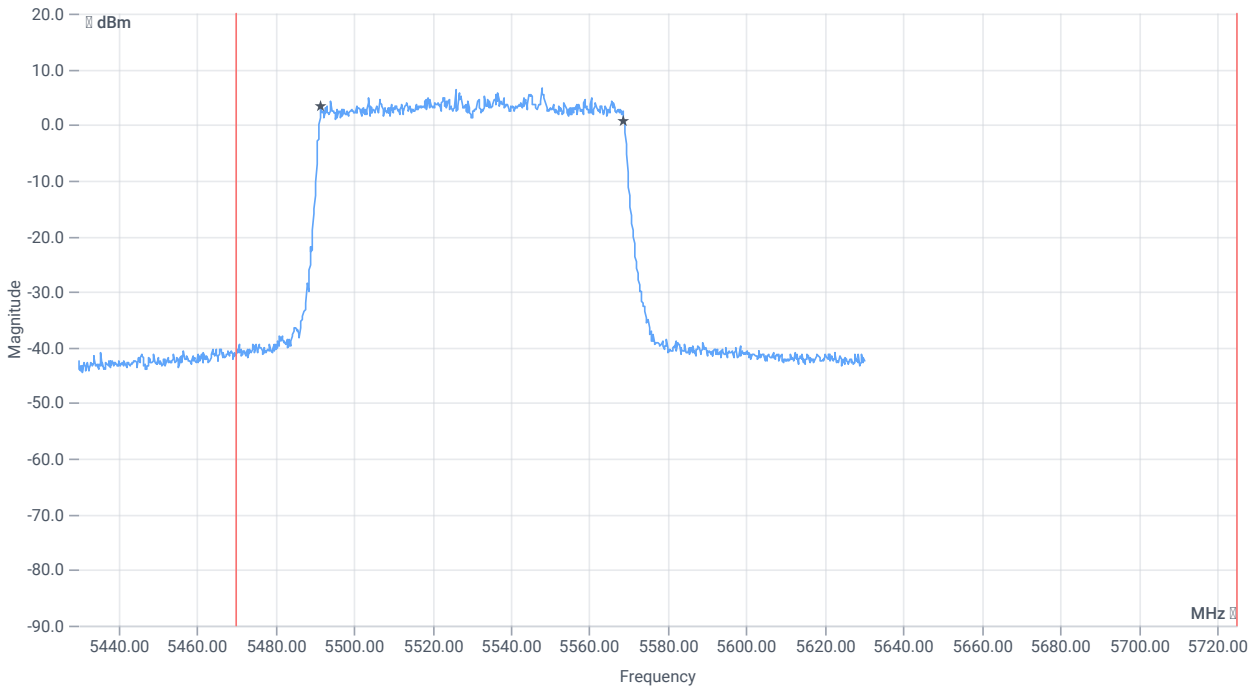
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	5.03	dBm	INFO
Ref. Frequency	--	--	5527.400	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	13.03 16.77 15
Start [MHz] Stop [MHz]	5430.000 5630.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

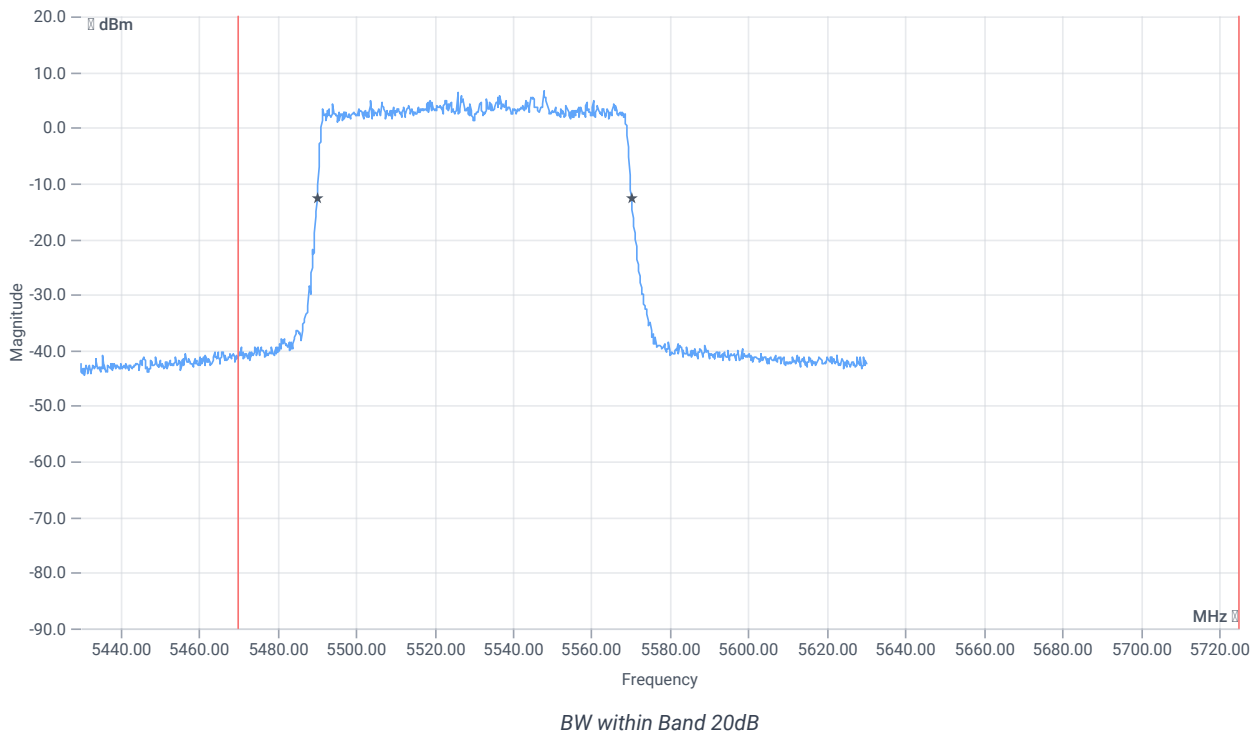
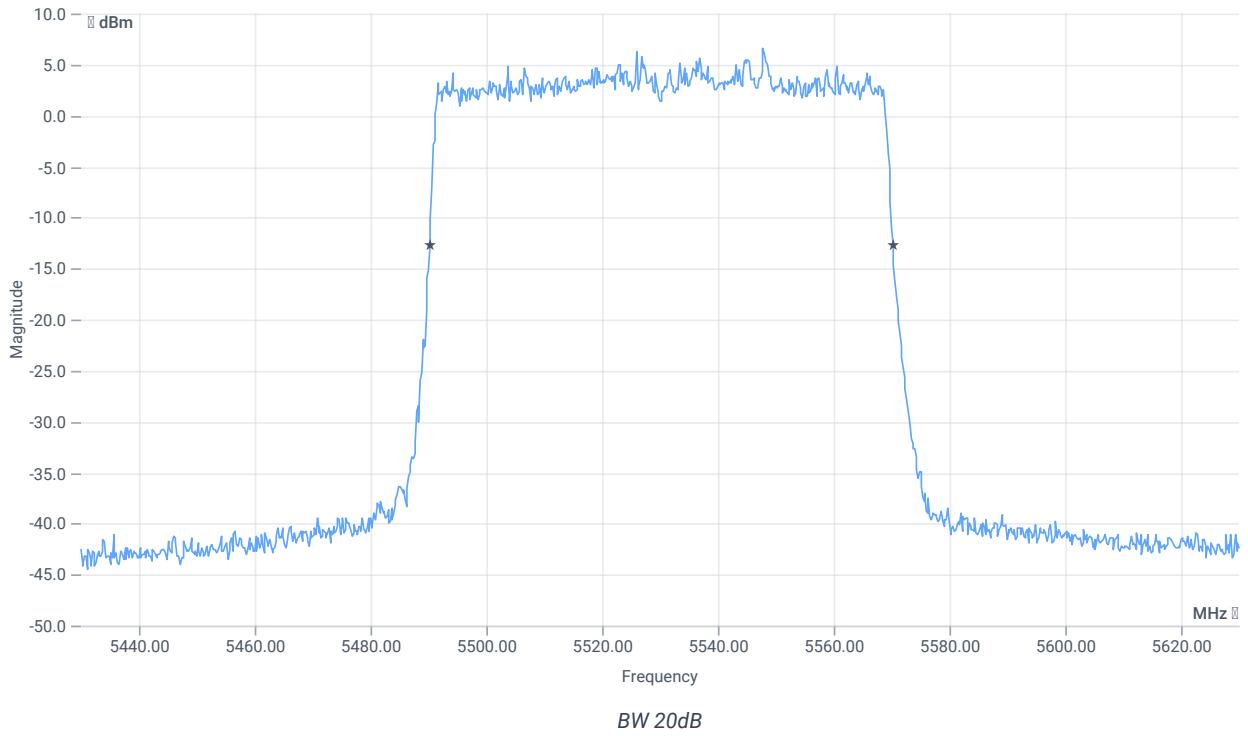




BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.123	MHz	INFO
T1 99%	5470.000000	--	5491.6384	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5568.7612	MHz	



RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5490.2000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5570.2000	MHz	

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:35:47
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS48

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5530 MHz

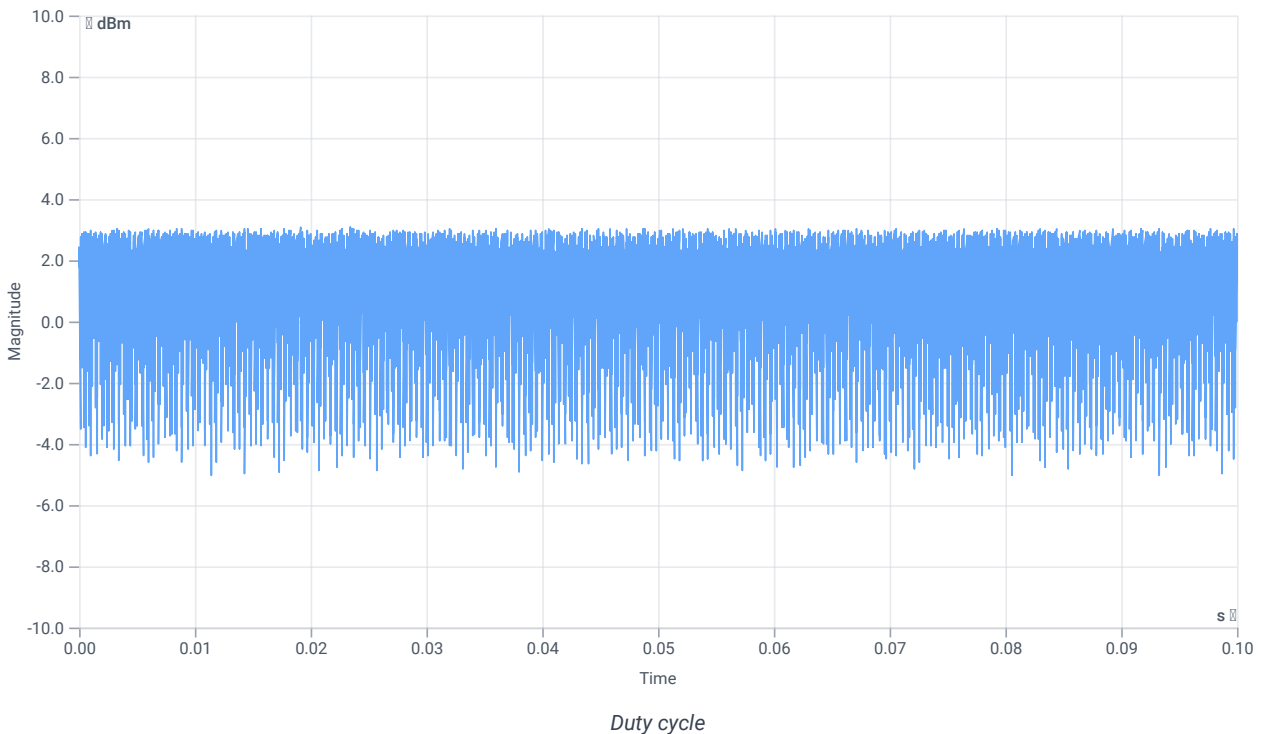
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.12	dBm	INFO
Ref. Frequency	--	--	5527.800	MHz	INFO

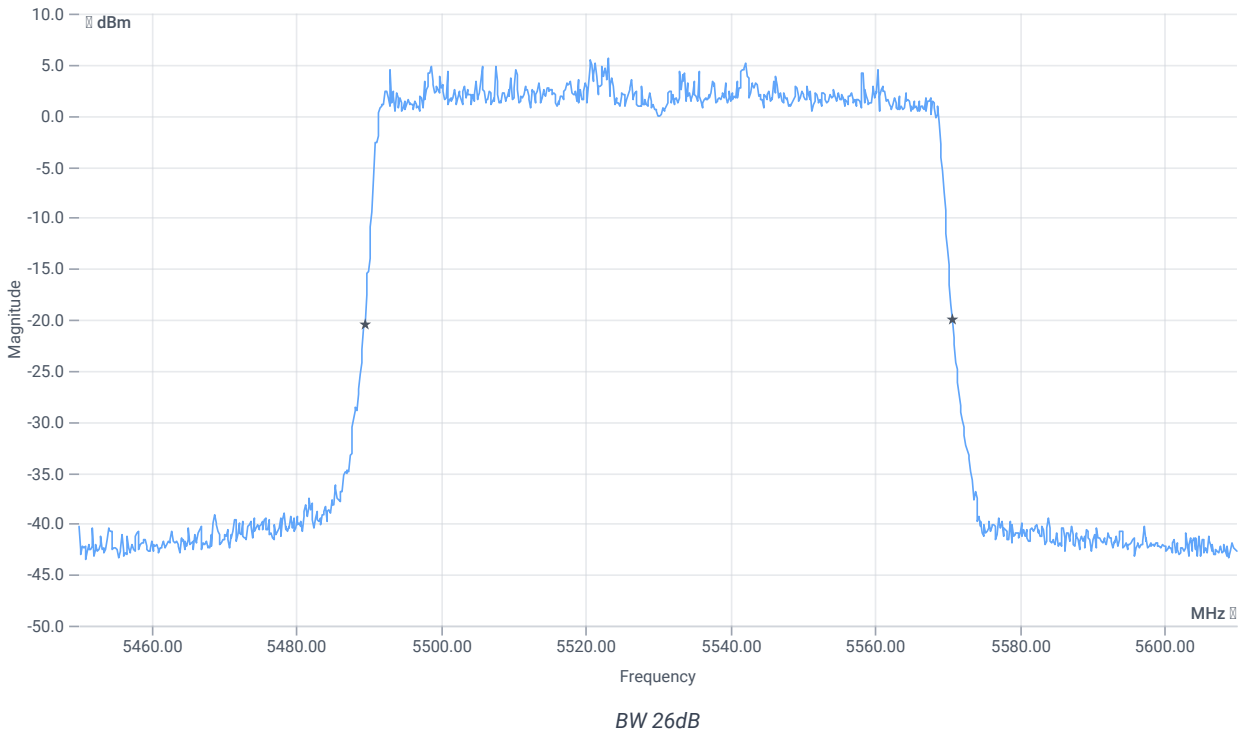
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



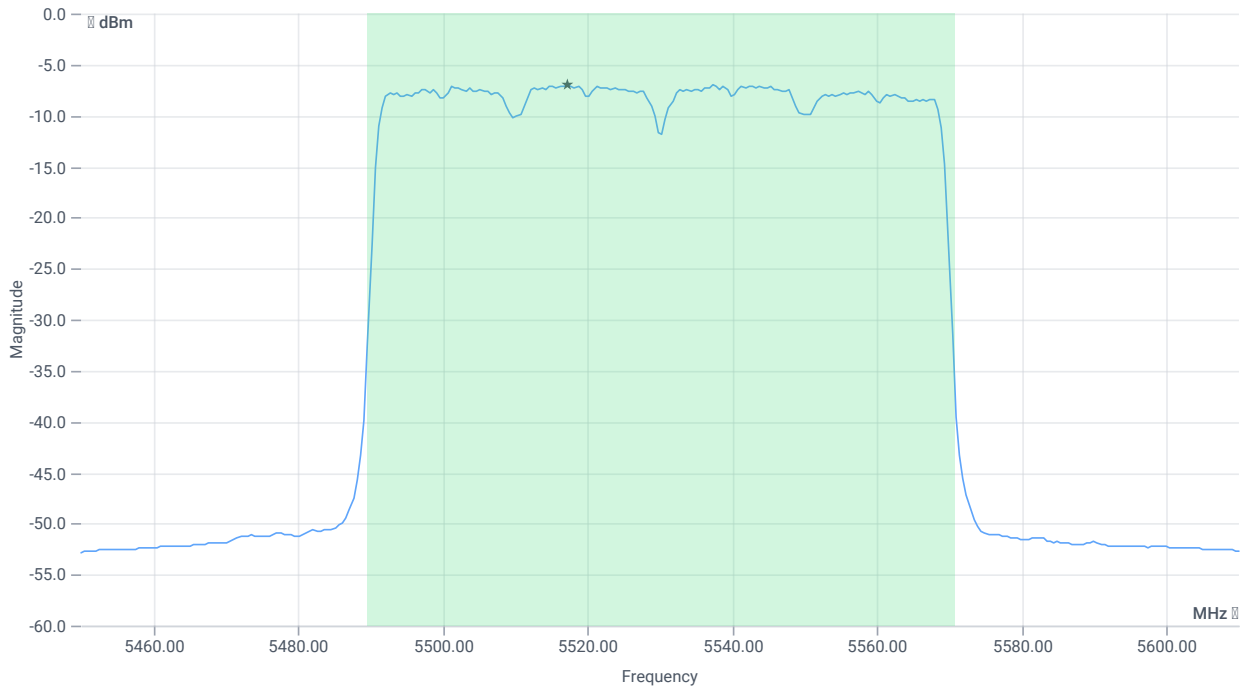
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.12	MHz	INFO
T1 26dB	---	---	5489.5200	MHz	INFO
T2 26dB	---	---	5570.6400	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	15.12 16.77 15
Start [MHz] Stop [MHz]	5450.000 5610.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	10.73	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	10.73	dBm	PASS
Limit: 11 dBm + 10 log 81.12					
Max Output Power DC corrected	--	30.09	10.73	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	-6.96	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	-6.96	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:38:15
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS48

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

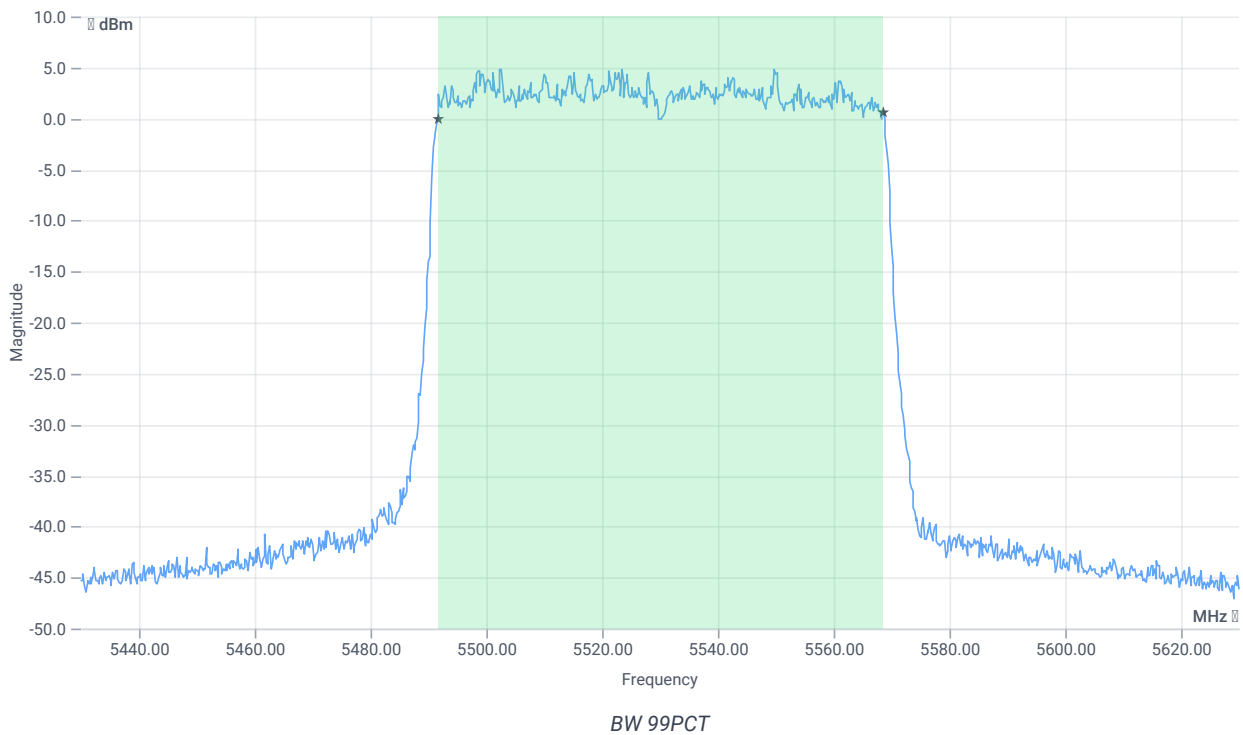
Test at TX 5530 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	3.67	dBm	INFO
Ref. Frequency	--	--	5528.000	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	11.67 16.77 10
Start [MHz] Stop [MHz]	5430.000 5630.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

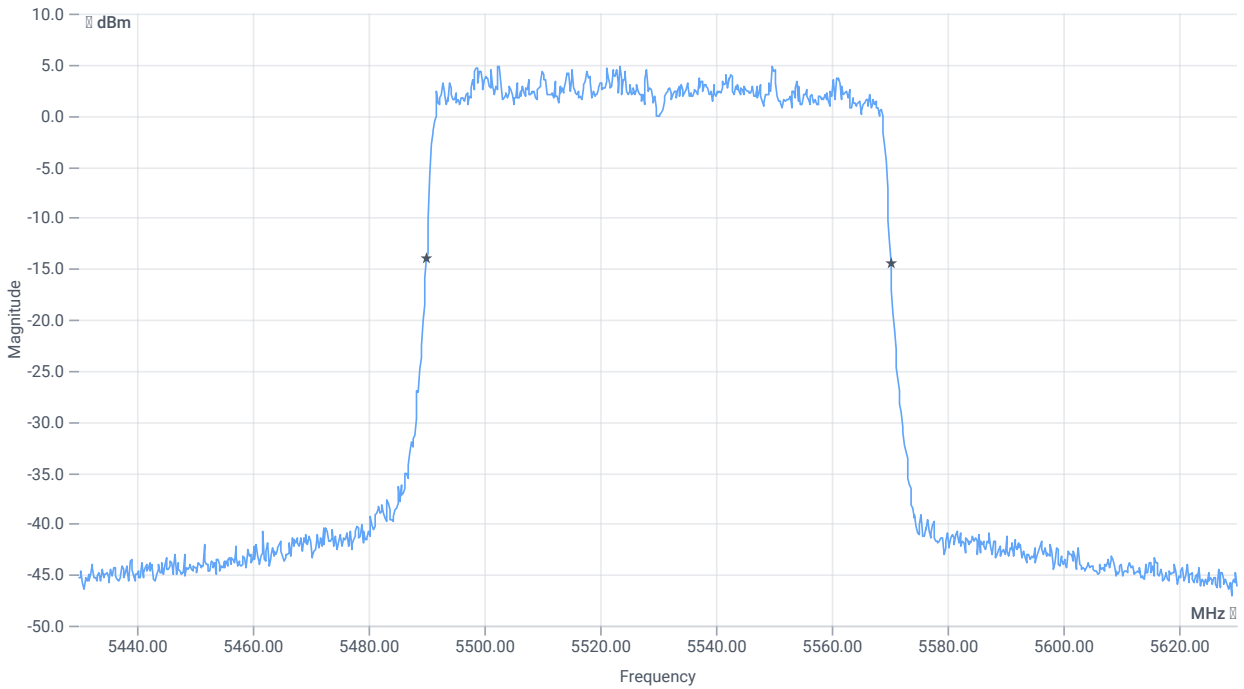




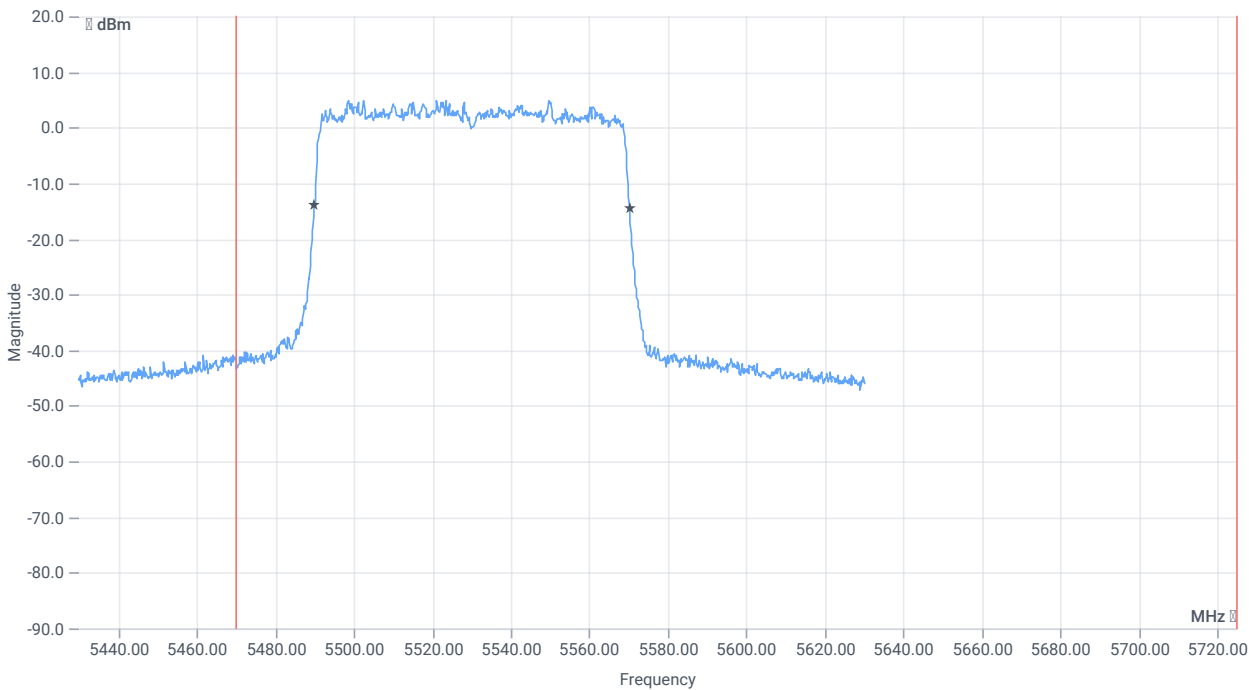
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	76.923	MHz	INFO
T1 99%	5470.000000	--	5491.6384	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5568.5614	MHz	



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80.2	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5490.0000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5570.2000	MHz	

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:38:52
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	True Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5530 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	11.59	dBm	INFO
Ant:1 BW 26dB	--	--	81.440	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	10.73	dBm	INFO
Ant:2 BW 26dB	--	--	81.120	MHz	INFO
Σ Limit absolute	--	24	14.19	dBm	PASS
Σ Limit: 11 dBm + 10 log 81.12	--	30.09	14.19	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	-6.02	dBm/1MHz	INFO
Ant:2 PSD	--	--	-6.96	dBm/1MHz	INFO
Σ	--	11	-3.45	dBm/1MHz	PASS

Verdict

PASS

NA # Message with SA scan ~

References

TC start	28.07.2023 11:41:05
Ambit temp [°C] humidity [rel%]	25.3 53
System version	4.6.0.1
Standard Version	NA NI
Method	
Description	Message with SA Scan ax_HE80_U_NII_2C
Information	PS82

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	28.07.2023 11:41:05
Message	set WLAN5Gx to ax_HE80_U_NII_2C, Frequency [MHz] 5610 , Information: PS82

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:41:14
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	True Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5610 MHz

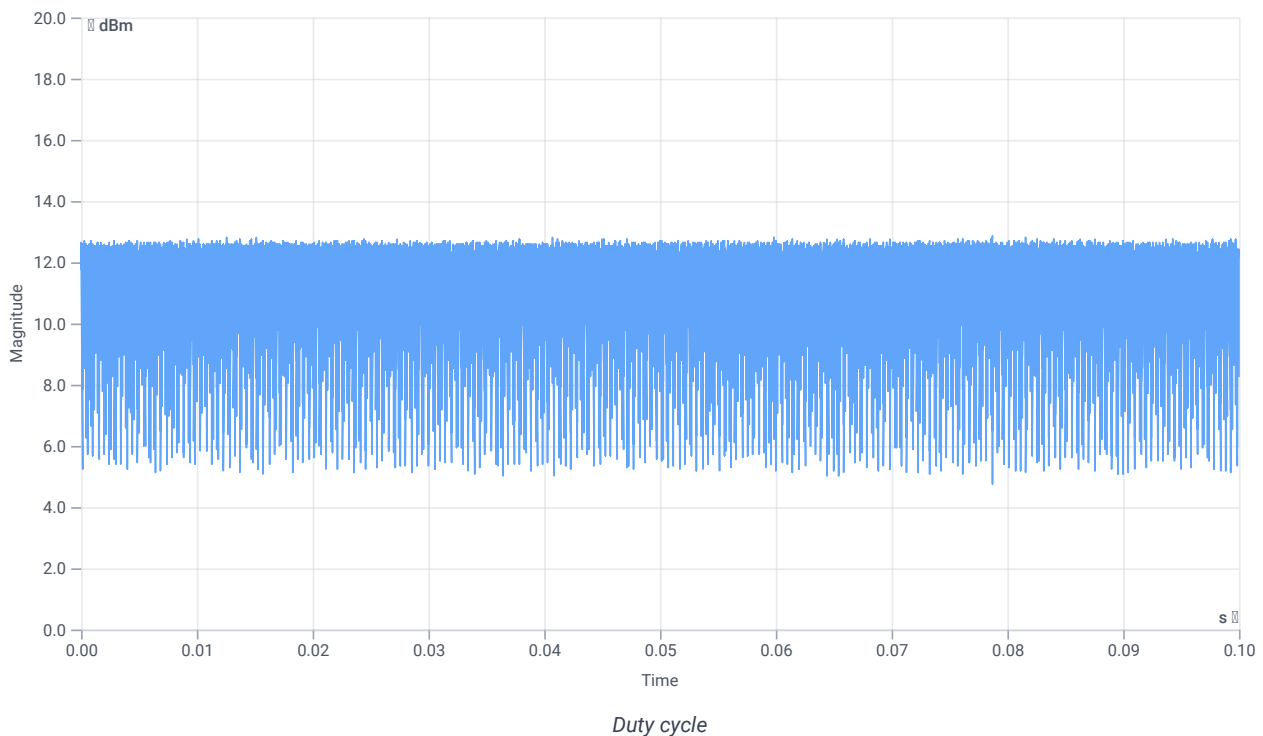
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.03	dBm	INFO
Ref. Frequency	--	--	5645.160	MHz	INFO

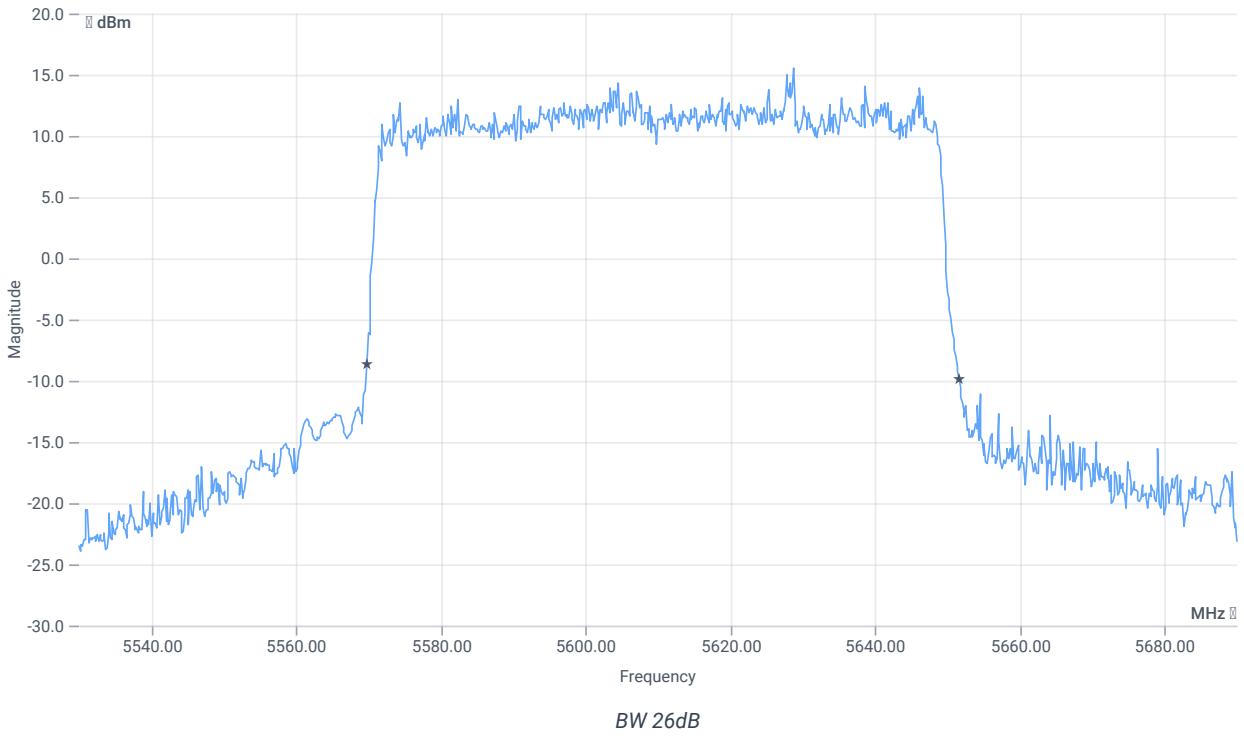
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



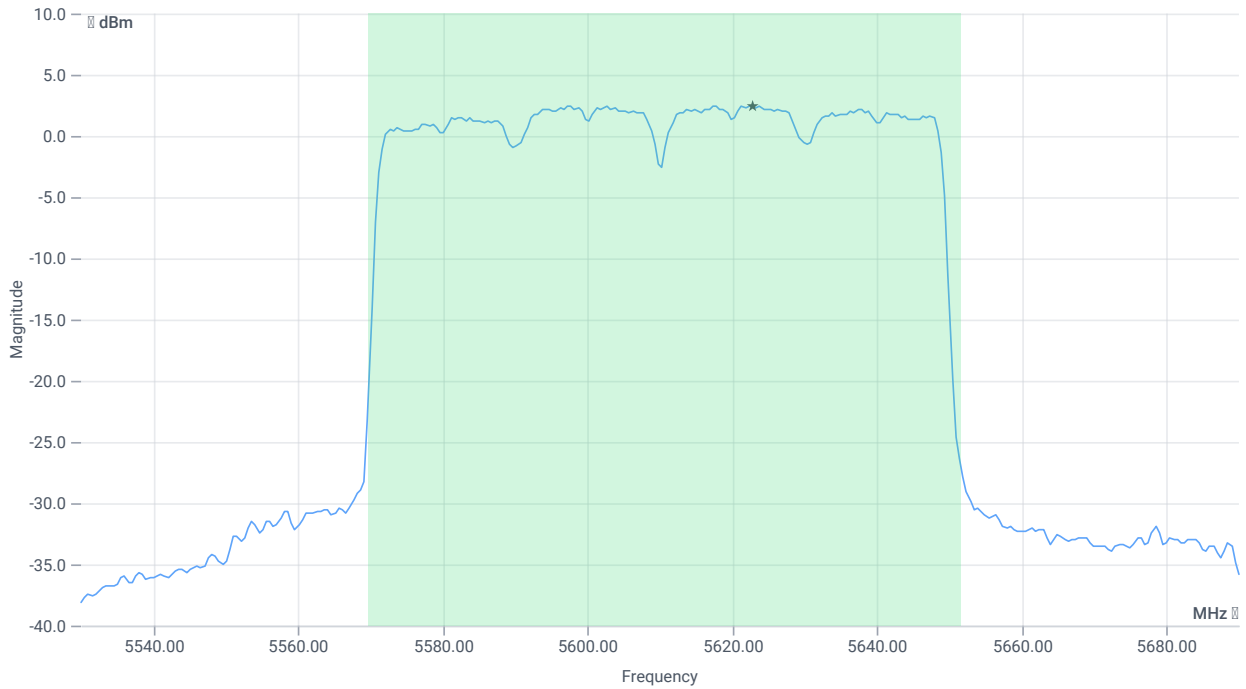
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.92	MHz	INFO
T1 26dB	---	---	5569.6800	MHz	INFO
T2 26dB	---	---	5651.6000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.03 16.62 25
Start [MHz] Stop [MHz]	5530.000 5690.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	20.08	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	20.08	dBm	PASS
Limit: 11 dBm + 10 log 81.92					
Max Output Power DC corrected	--	30.13	20.08	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	2.48	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	2.48	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:43:42
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	True Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

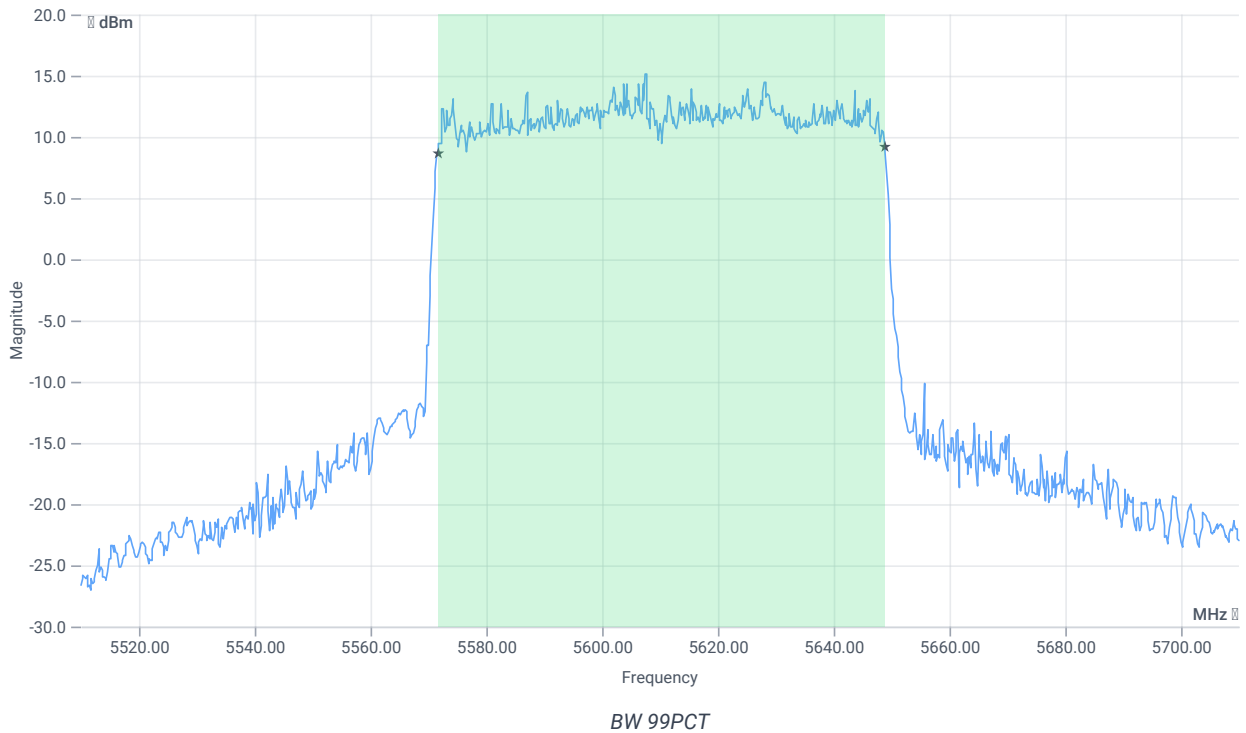
Test at TX 5610 MHz

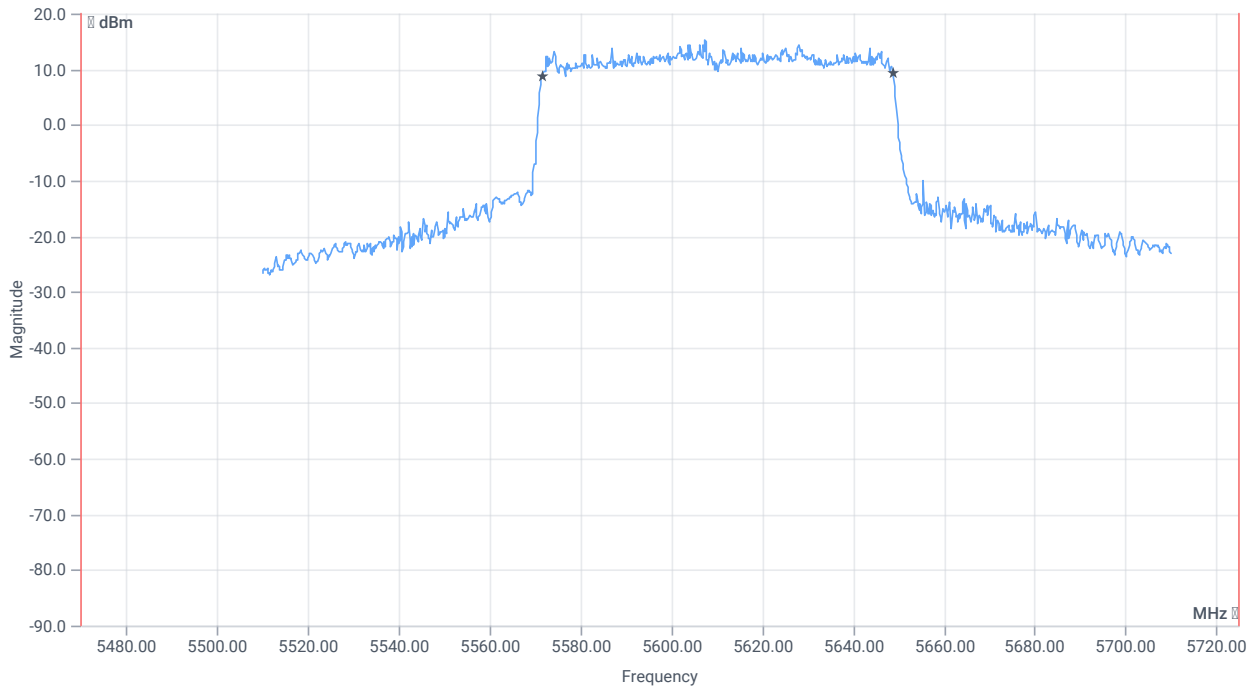
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	11.90	dBm	INFO
Ref. Frequency	--	--	5589.220	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	19.90 16.62 20
Start [MHz] Stop [MHz]	5510.000 5710.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

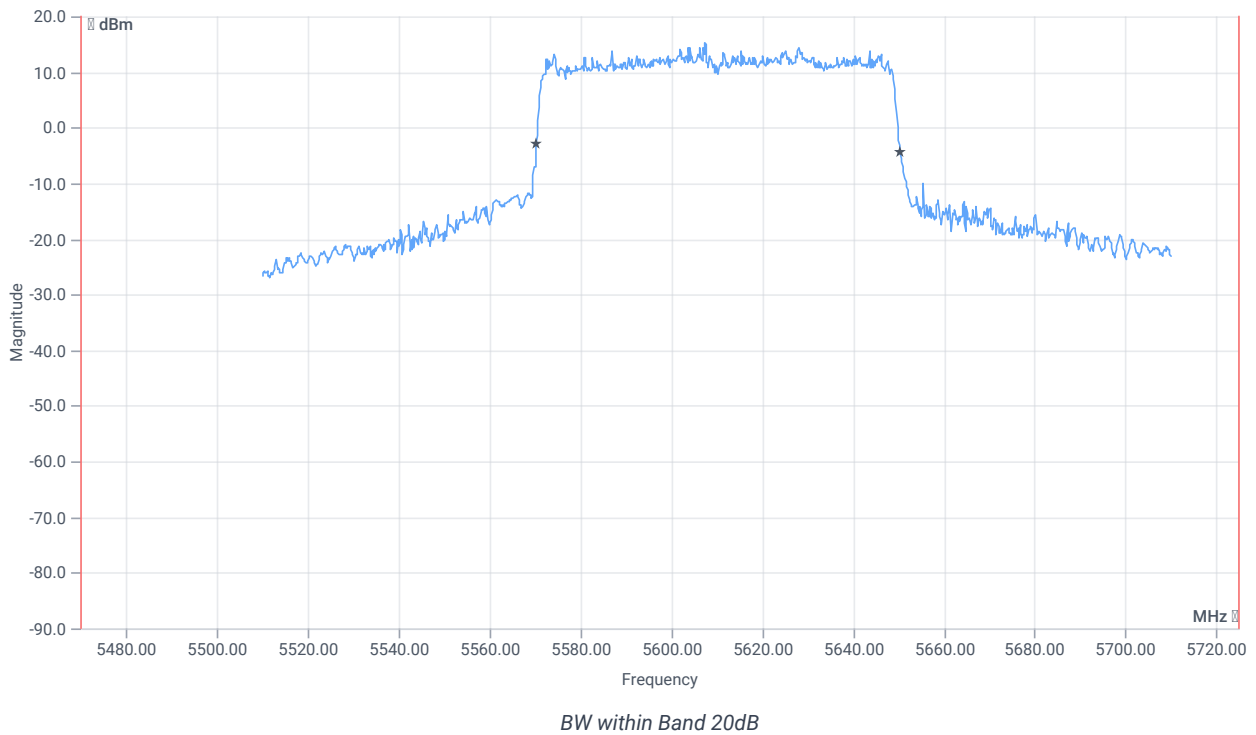
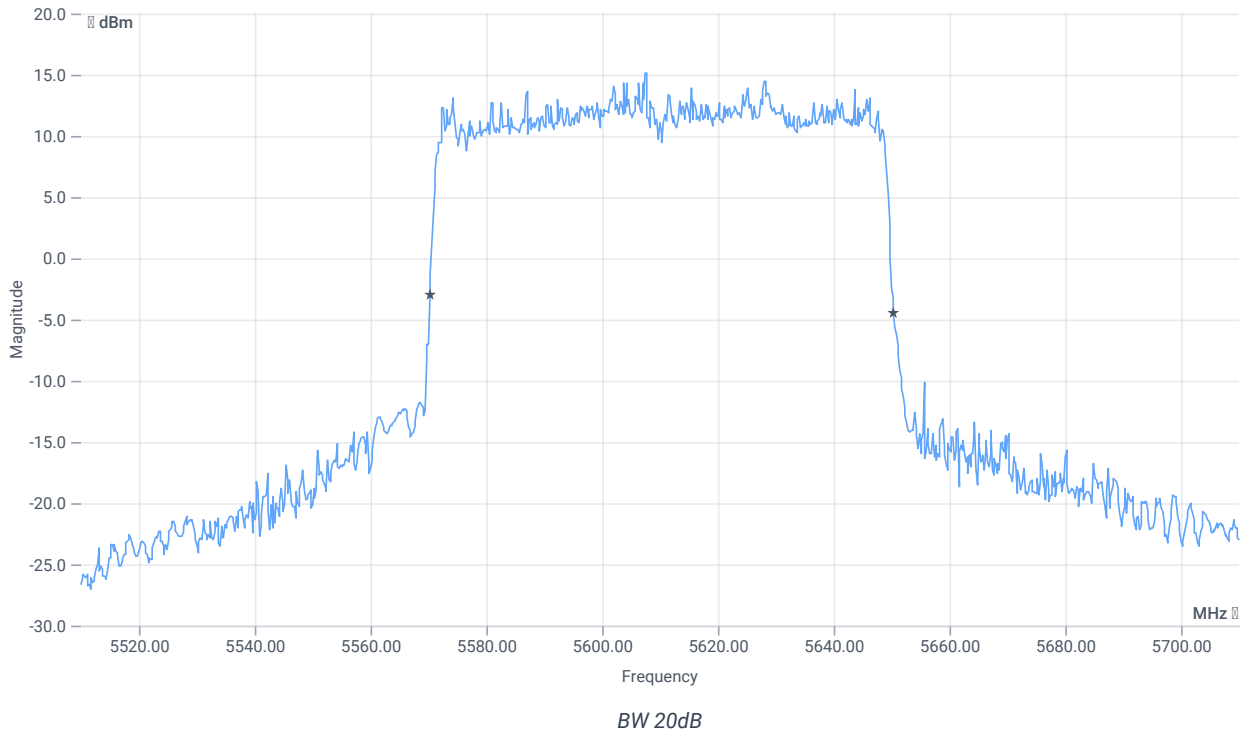




BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.123	MHz	INFO
T1 99%	5470.000000	--	5571.6384	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5648.7612	MHz	



RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80.2	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5570.2000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5650.4000	MHz	

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:44:19
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	True Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5610 MHz

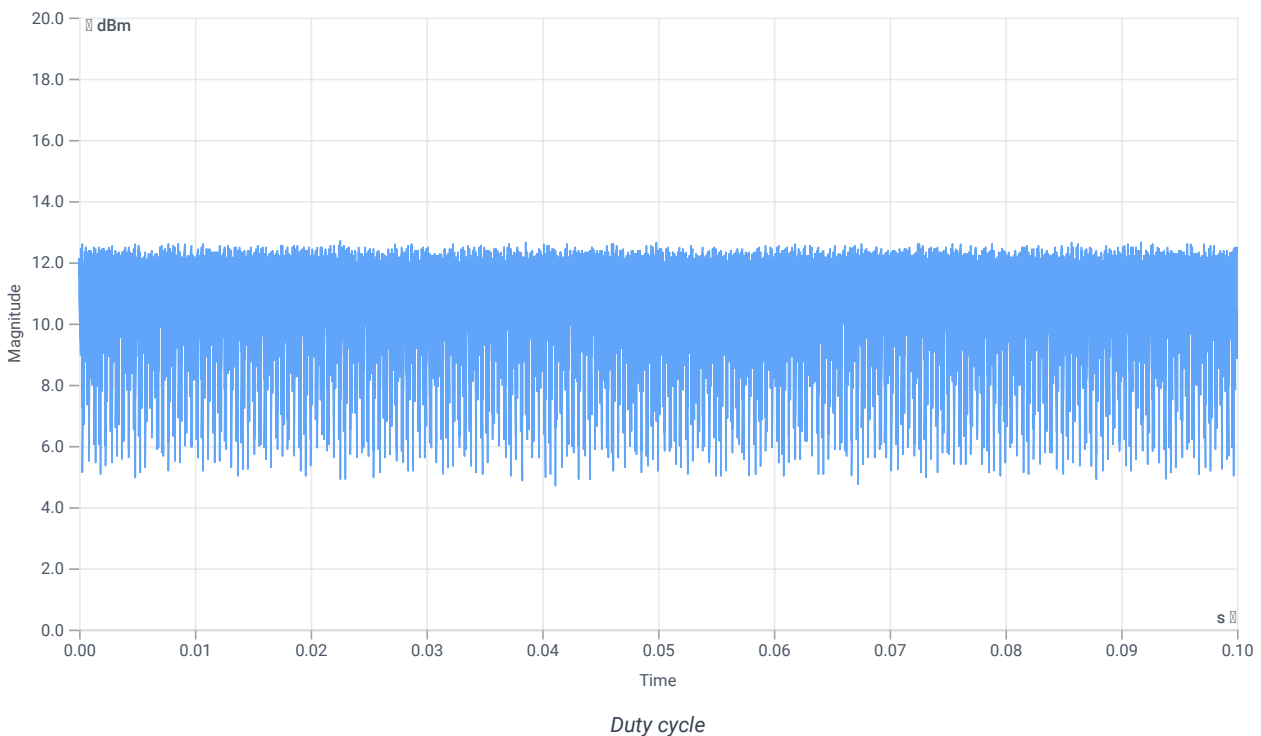
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	12.01	dBm	INFO
Ref. Frequency	--	--	5640.970	MHz	INFO

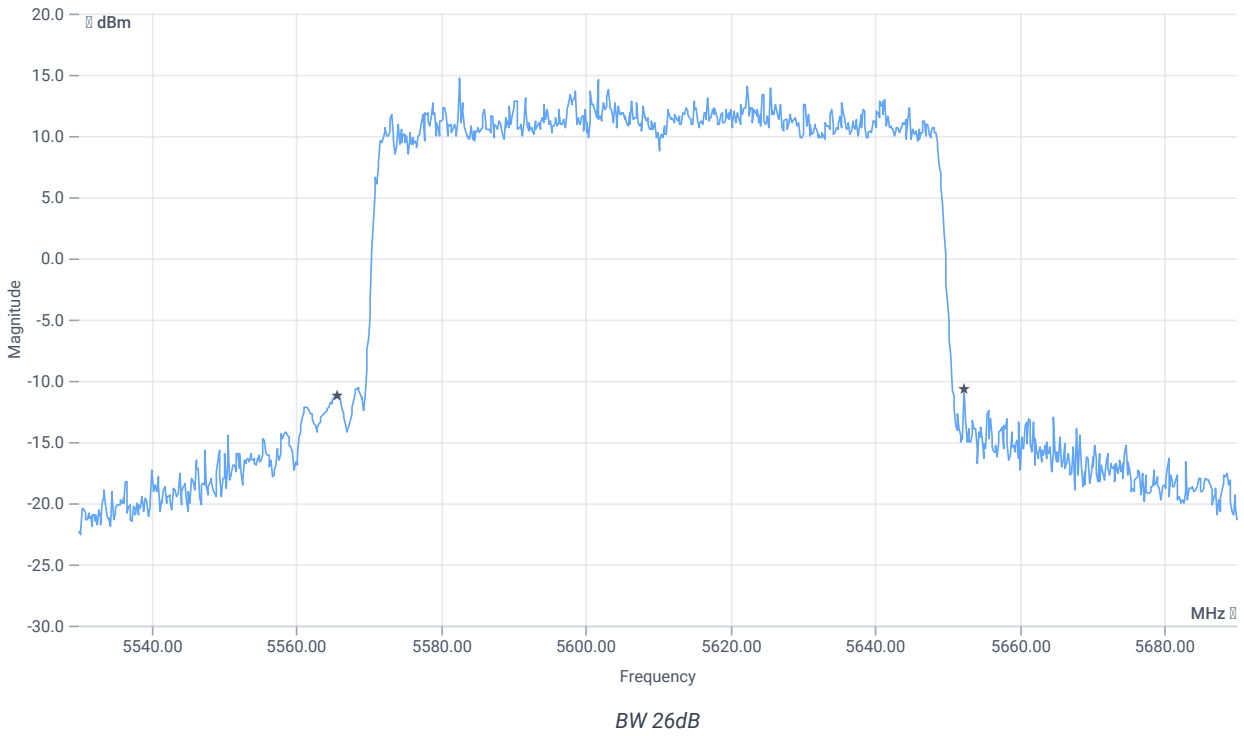
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



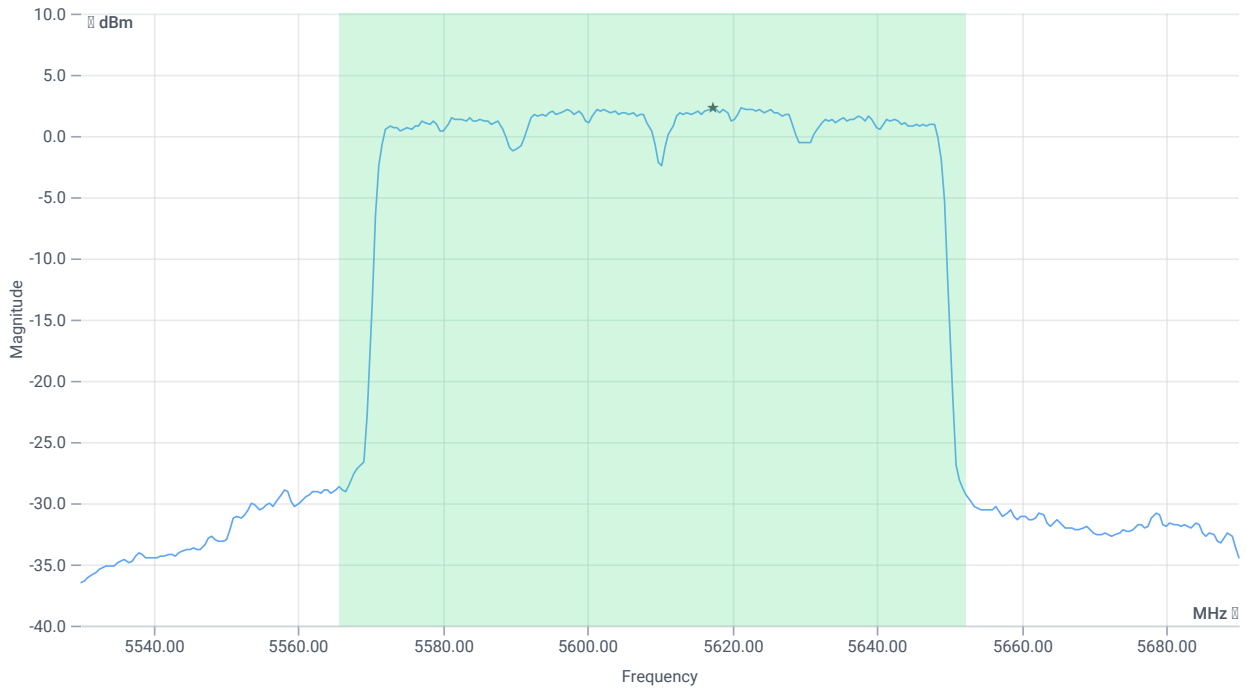
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	86.72	MHz	INFO
T1 26dB	---	---	5565.6800	MHz	INFO
T2 26dB	---	---	5652.4000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	24.01 16.62 25
Start [MHz] Stop [MHz]	5530.000 5690.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	19.87	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	19.87	dBm	PASS
Limit: 11 dBm + 10 log 86.72					
Max Output Power DC corrected	--	30.38	19.87	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	2.33	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	2.33	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 11:46:48
Ambit temp [°C] humidity [rel%]	25.2 53
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	True Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

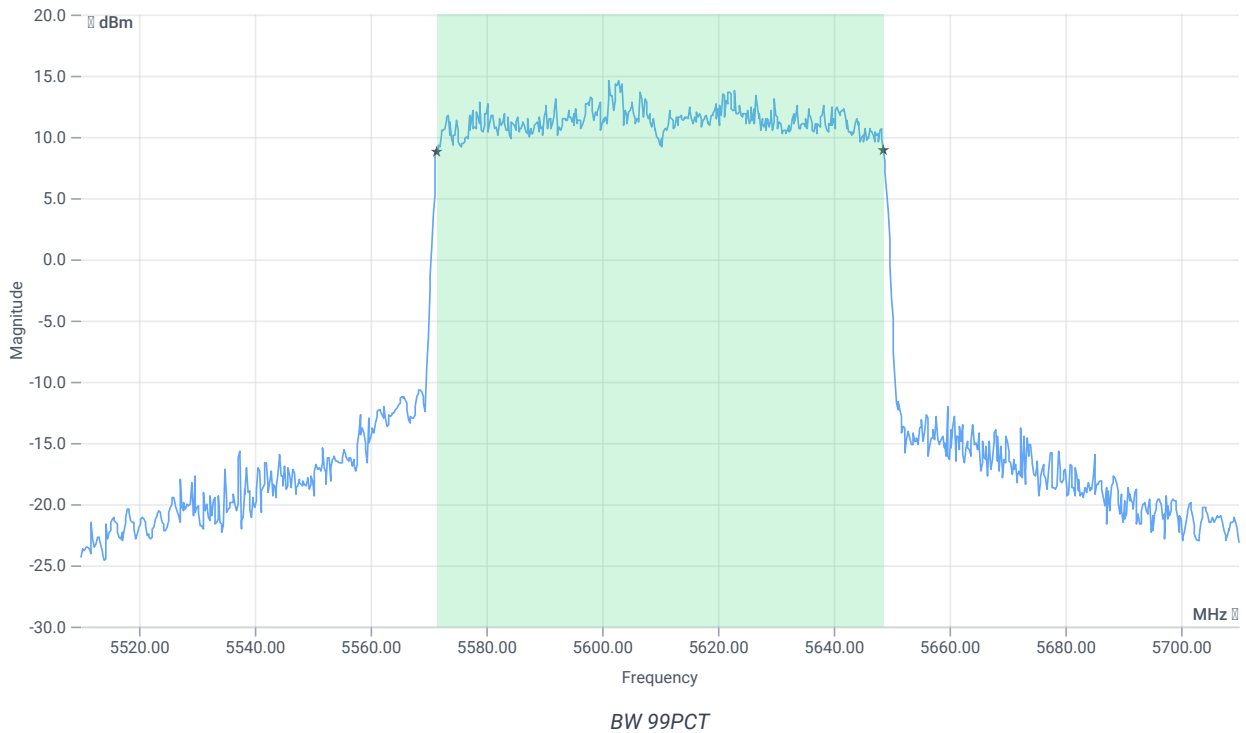
Test at TX 5610 MHz

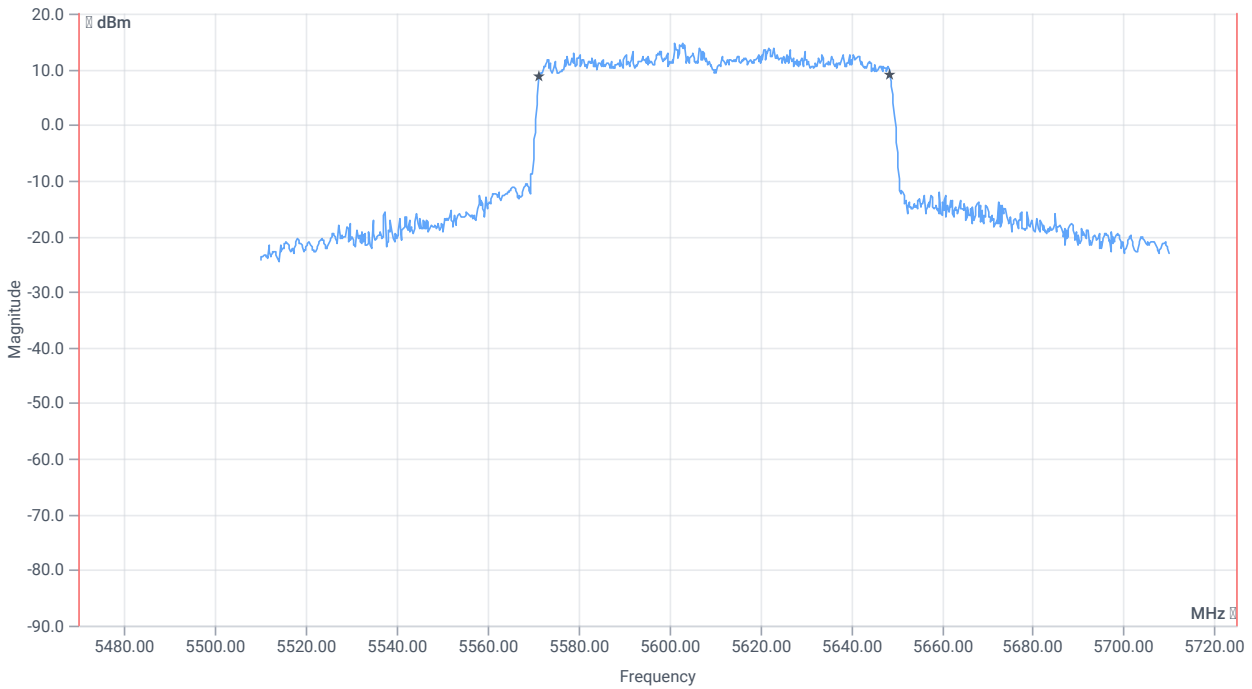
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	11.60	dBm	INFO
Ref. Frequency	--	--	5599.810	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	19.60 16.62 20
Start [MHz] Stop [MHz]	5510.000 5710.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

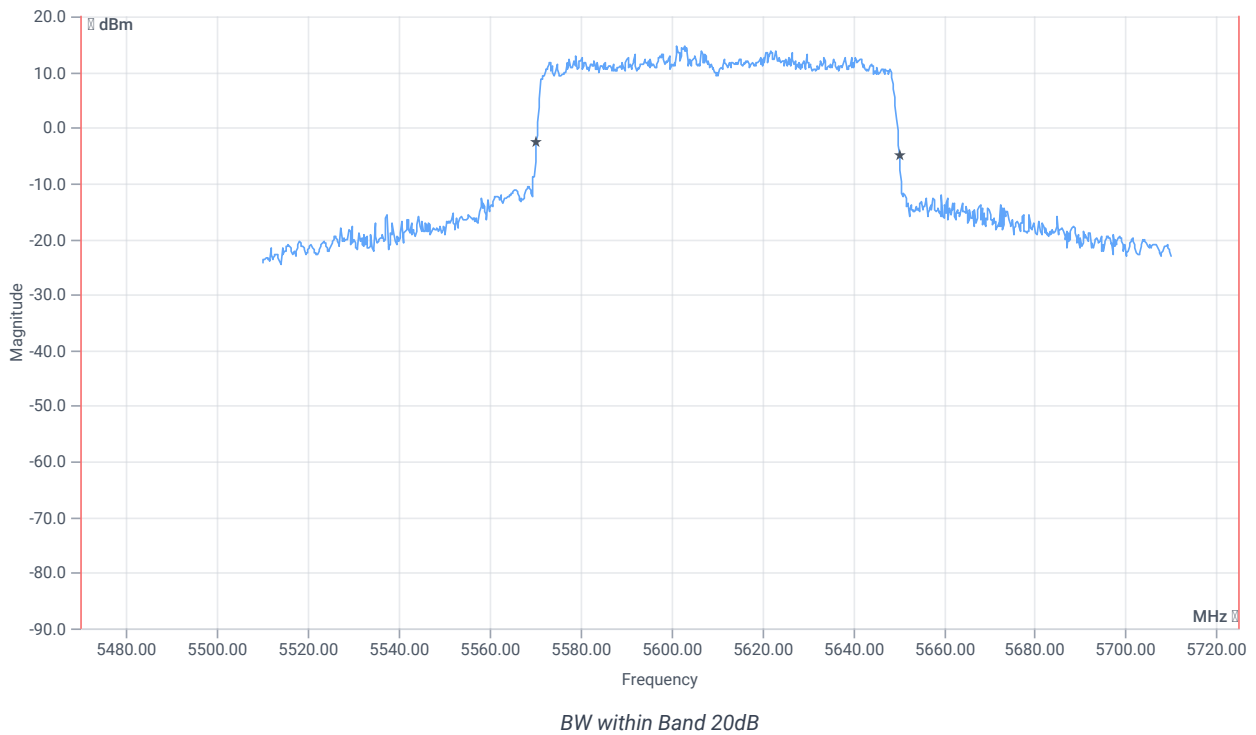
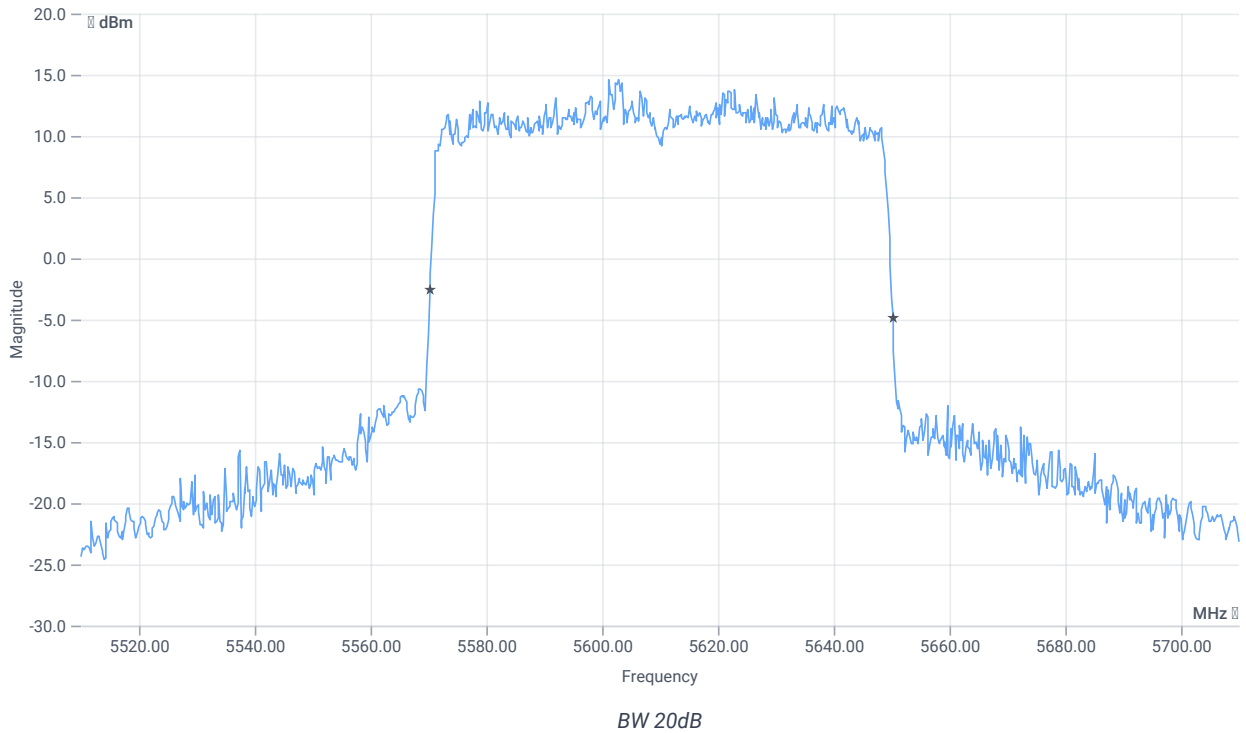




BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.123	MHz	INFO
T1 99%	5470.000000	--	5571.4386	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5648.5614	MHz	



RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5570.2000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5650.2000	MHz	

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:13:06
Ambit temp [°C] humidity [rel%]	25.0 54
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	True Freq [MHz] 5610
Frequency high to test	False Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5610 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	20.08	dBm	INFO
Ant:1 BW 26dB	--	--	81.920	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	19.87	dBm	INFO
Ant:2 BW 26dB	--	--	86.720	MHz	INFO
Σ Limit absolute	--	24	22.99	dBm	PASS
Σ Limit: 11 dBm + 10 log 81.92	--	30.13	22.99	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	2.48	dBm/1MHz	INFO
Ant:2 PSD	--	--	2.33	dBm/1MHz	INFO
Σ	--	11	5.42	dBm/1MHz	PASS

Verdict

PASS

NA # Message with SA scan ~

References

TC start	28.07.2023 12:14:34
Ambit temp [°C] humidity [rel%]	25.0 54
System version	4.6.0.1
Standard Version	NA NI
Method	
Description	Message with SA Scan ax_HE80_U_NII_2C
Information	PS82

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	28.07.2023 12:14:34
Message	set WLAN5Gx to ax_HE80_U_NII_2C, Frequency [MHz] 5690 Information: PS82

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:14:42
Ambit temp [°C] humidity [rel%]	25.0 54
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	True Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5690 MHz

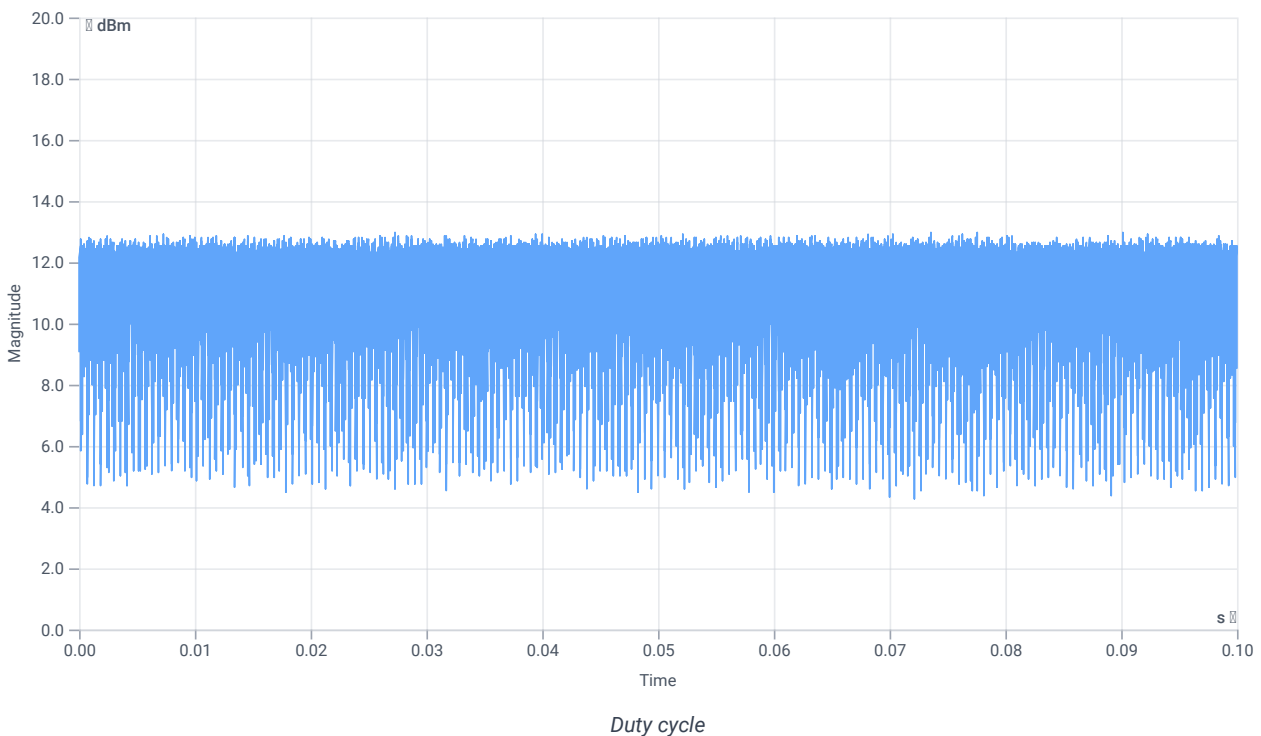
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	15.05	dBm	INFO
Ref. Frequency	--	--	5721.370	MHz	INFO

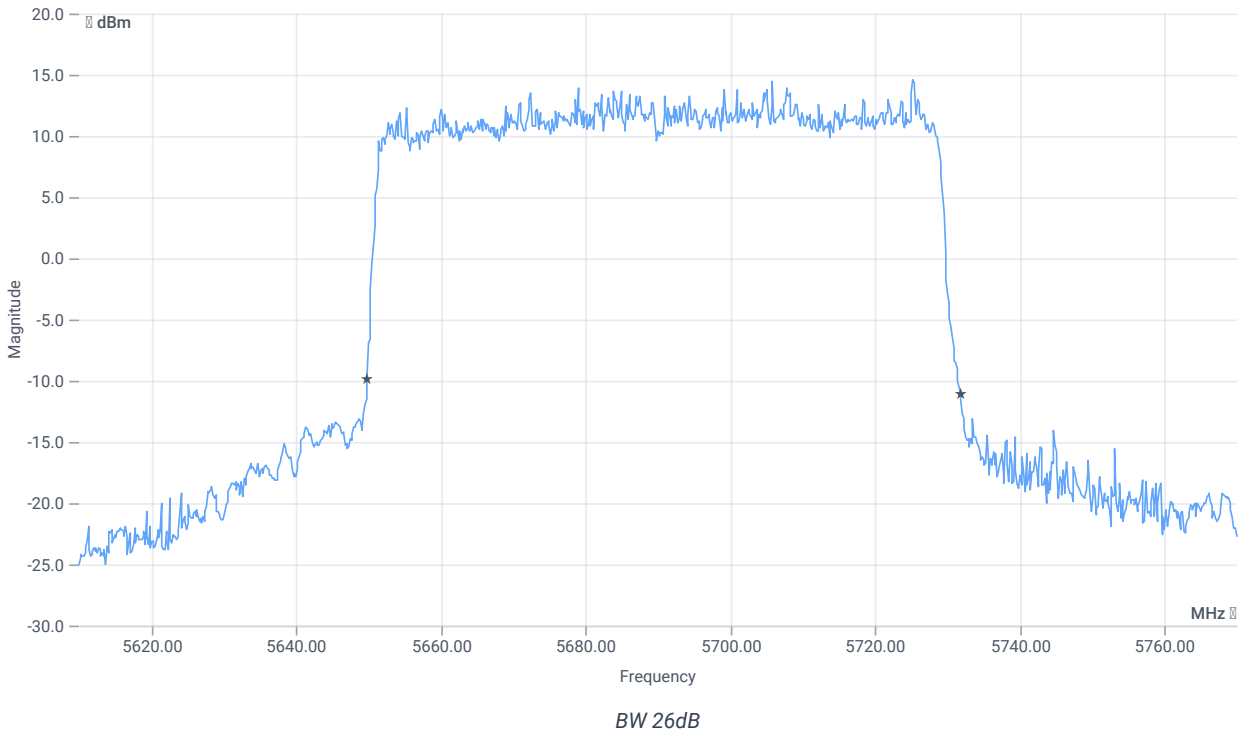
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



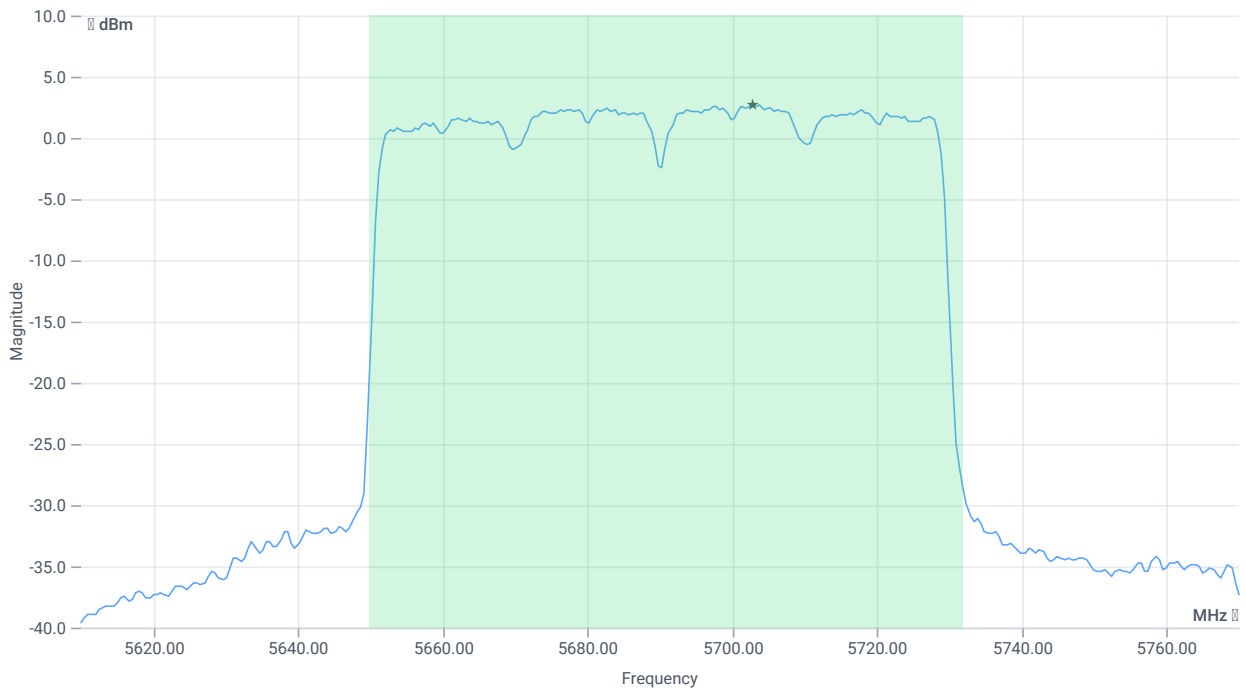
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.92	MHz	INFO
T1 26dB	---	---	5649.8400	MHz	INFO
T2 26dB	---	---	5731.7600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	27.05 16.56 25
Start [MHz] Stop [MHz]	5610.000 5770.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	20.16	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	20.16	dBm	PASS
Limit: 11 dBm + 10 log 81.92					
Max Output Power DC corrected	--	30.13	20.16	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	2.64	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	2.64	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:17:06
Ambit temp [°C] humidity [rel%]	25.1 54
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	True Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

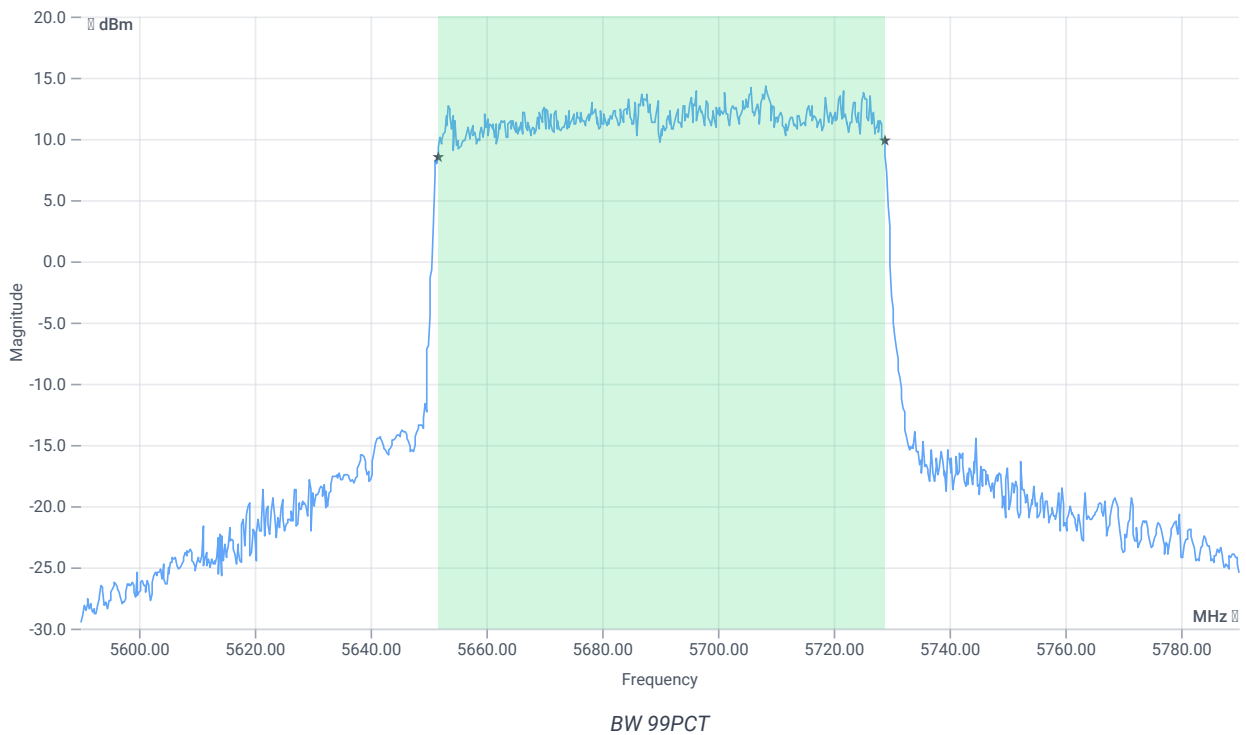
Test at TX 5690 MHz

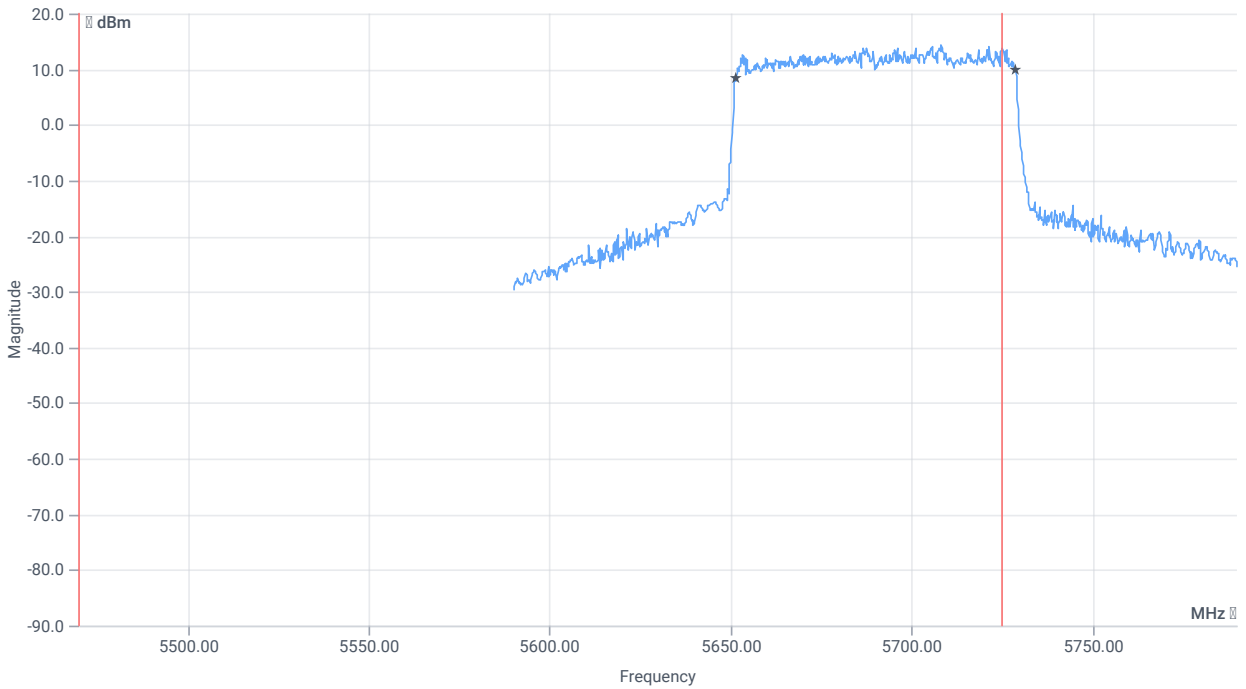
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	12.69	dBm	INFO
Ref. Frequency	--	--	5708.380	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	20.69 16.56 20
Start [MHz] Stop [MHz]	5590.000 5790.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

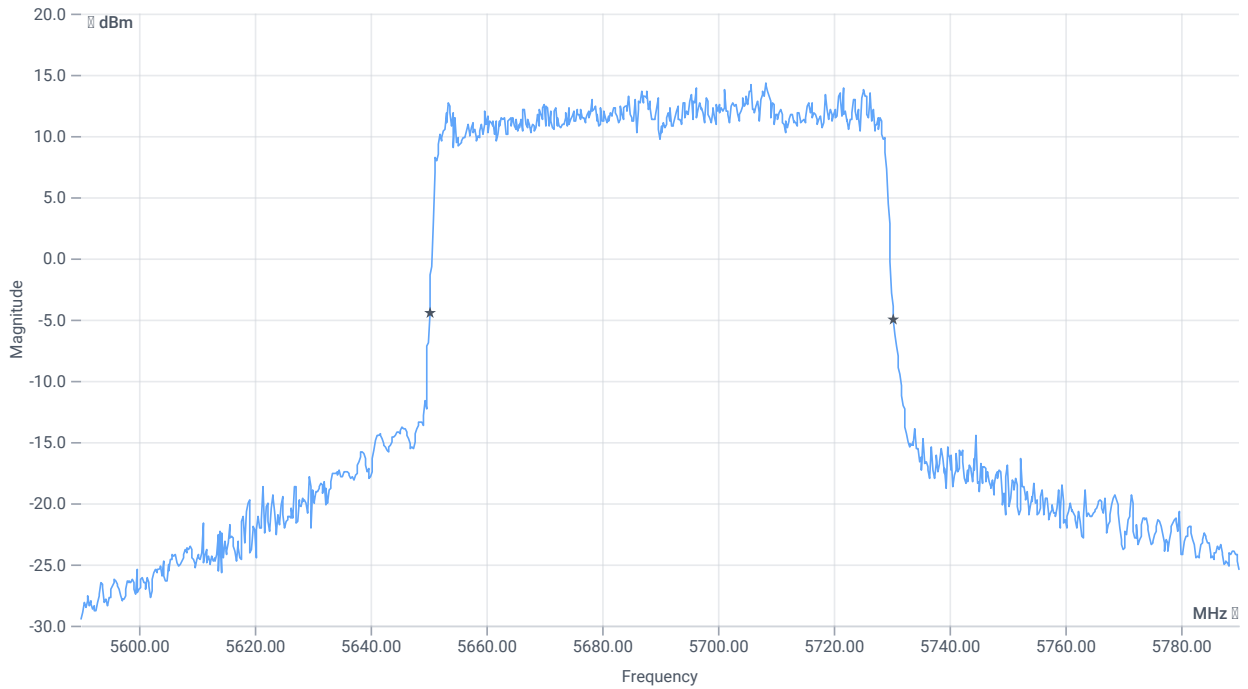




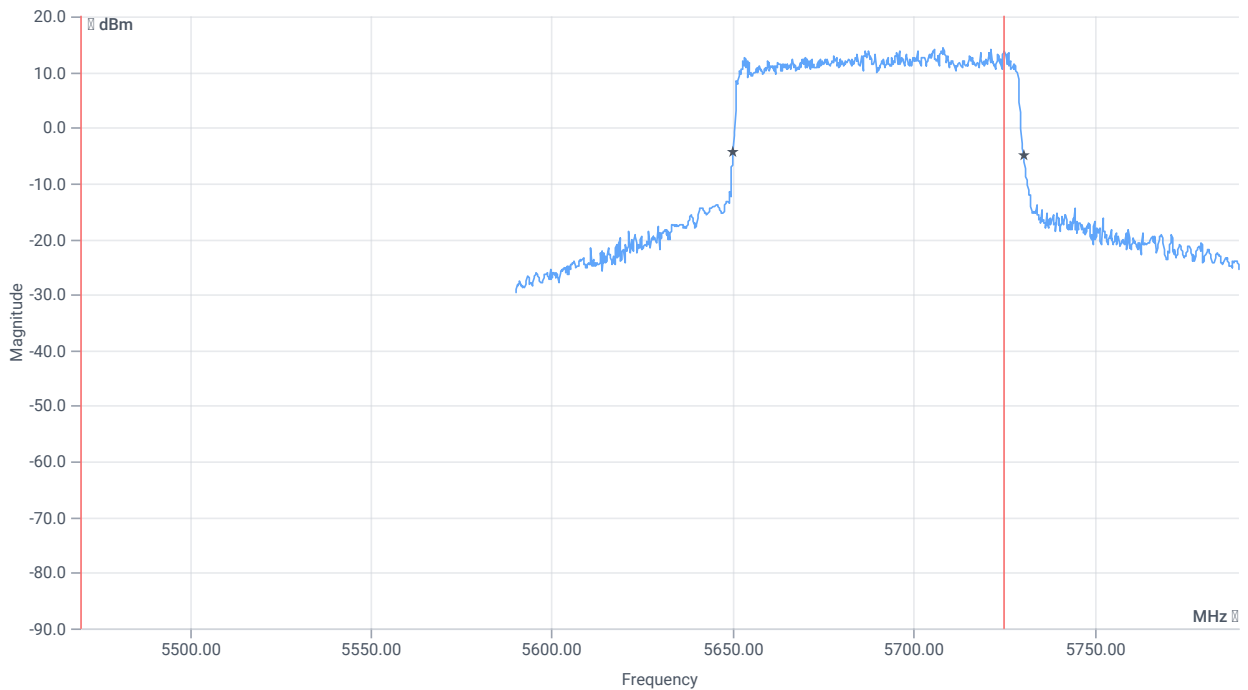
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.123	MHz	INFO
T1 99%	5470.000000	--	5651.6384	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5728.7612	MHz	



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80.2	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5650.2000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5730.4000	MHz	

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:17:43
Ambit temp [°C] humidity [rel%]	25.1 54
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	True Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5690 MHz

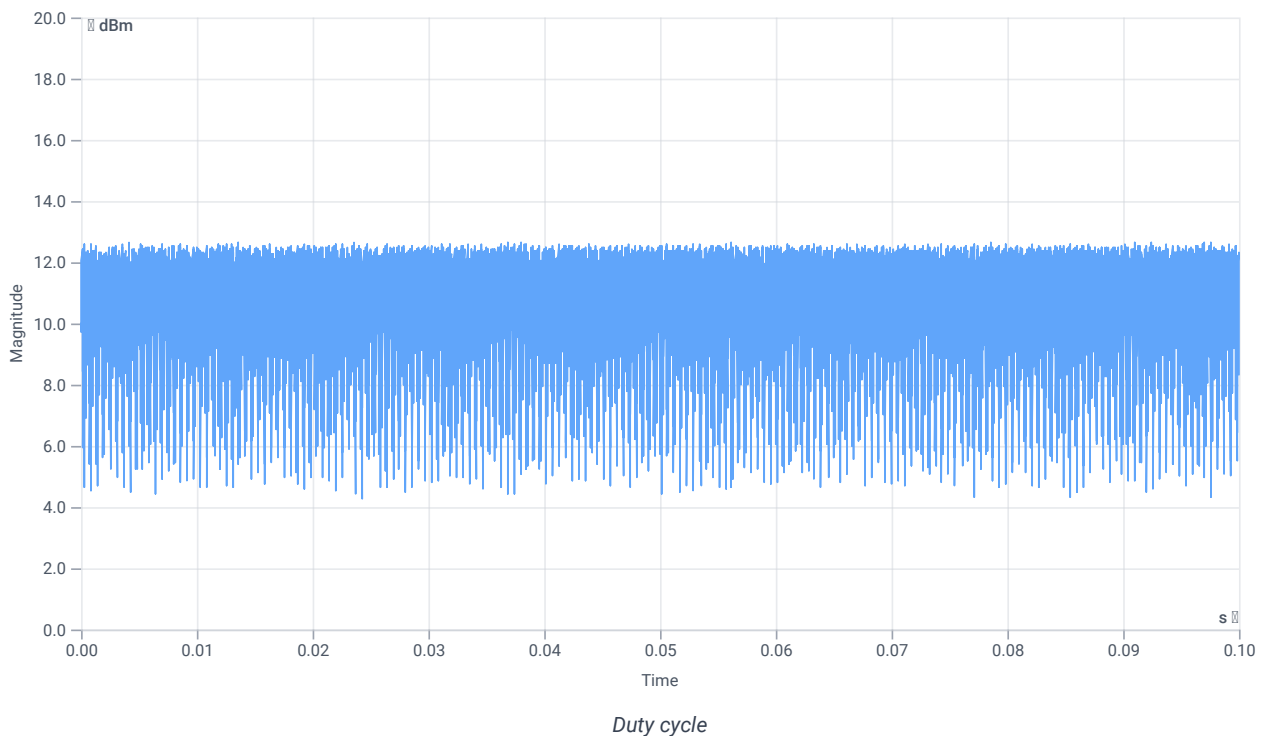
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	12.76	dBm	INFO
Ref. Frequency	--	--	5664.830	MHz	INFO

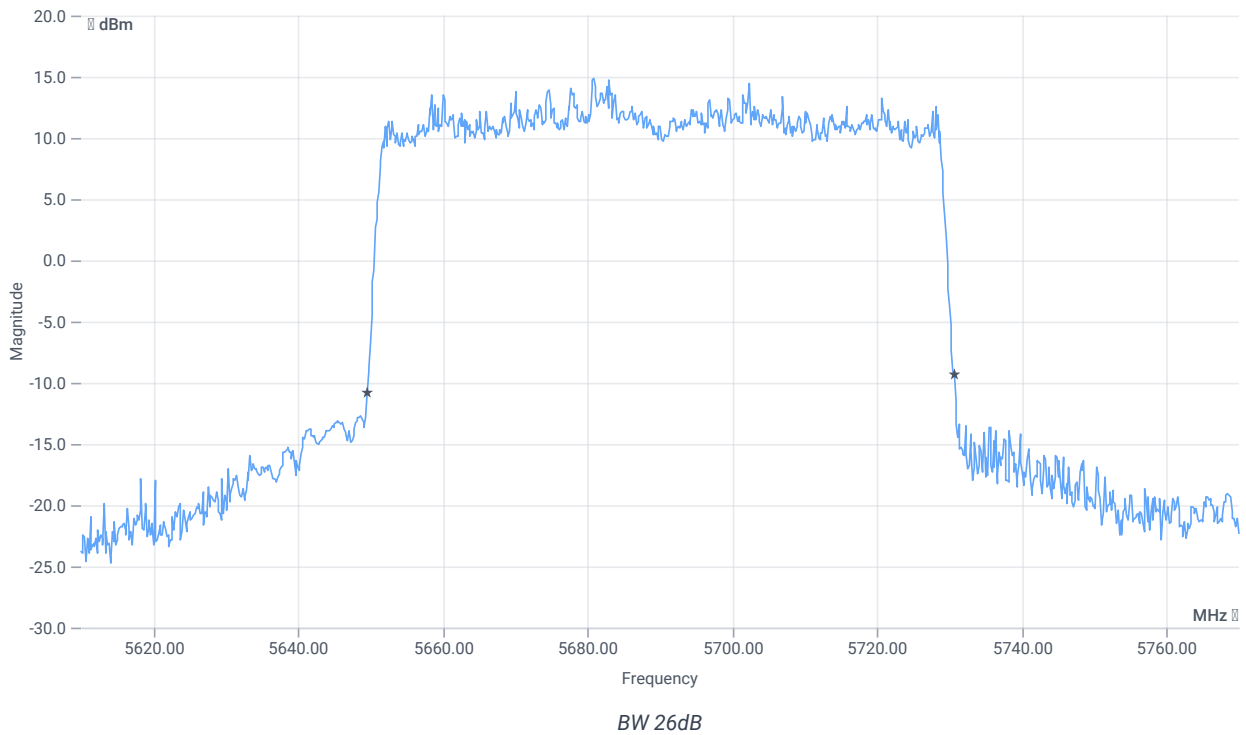
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



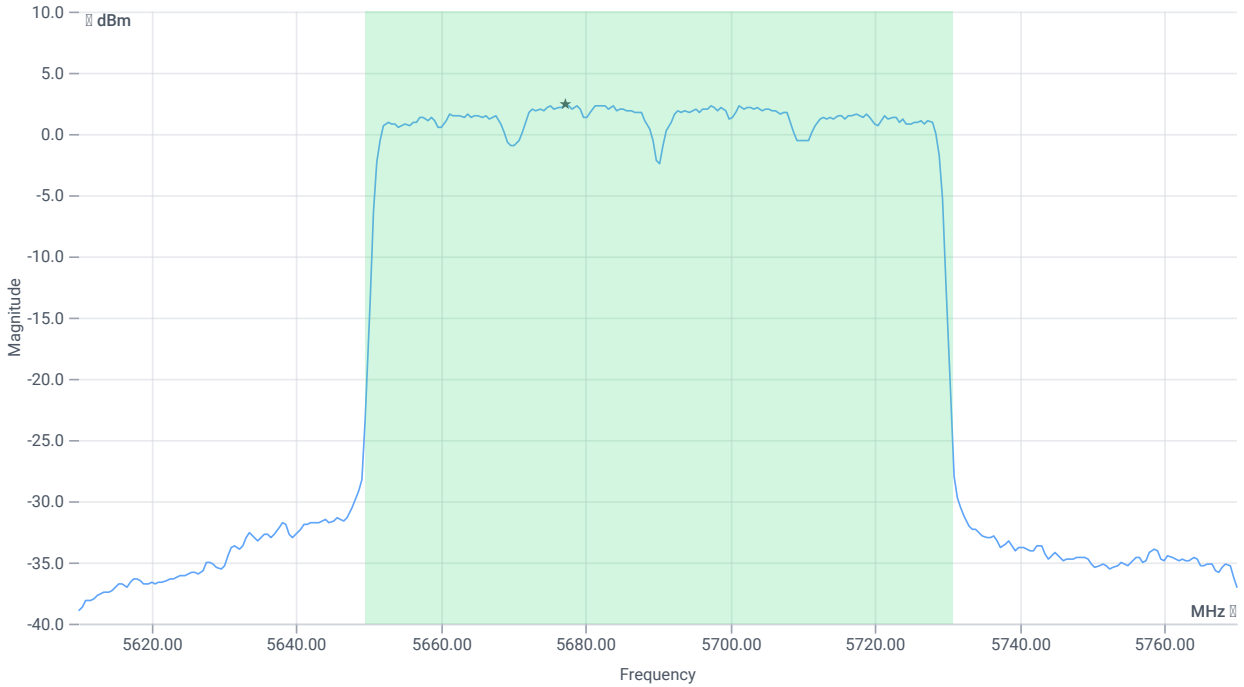
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	81.12	MHz	INFO
T1 26dB	---	---	5649.5200	MHz	INFO
T2 26dB	---	---	5730.6400	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	24.76 16.56 25
Start [MHz] Stop [MHz]	5610.000 5770.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	19.98	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	24	19.98	dBm	PASS
Limit: 11 dBm + 10 log 81.12					
Max Output Power DC corrected	--	30.09	19.98	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	2.46	dBm/1MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	11	2.46	dBm/1MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:20:07
Ambit temp [°C] humidity [rel%]	25.1 54
System version	4.6.0.1
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-2C
Information	PS82

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	True Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

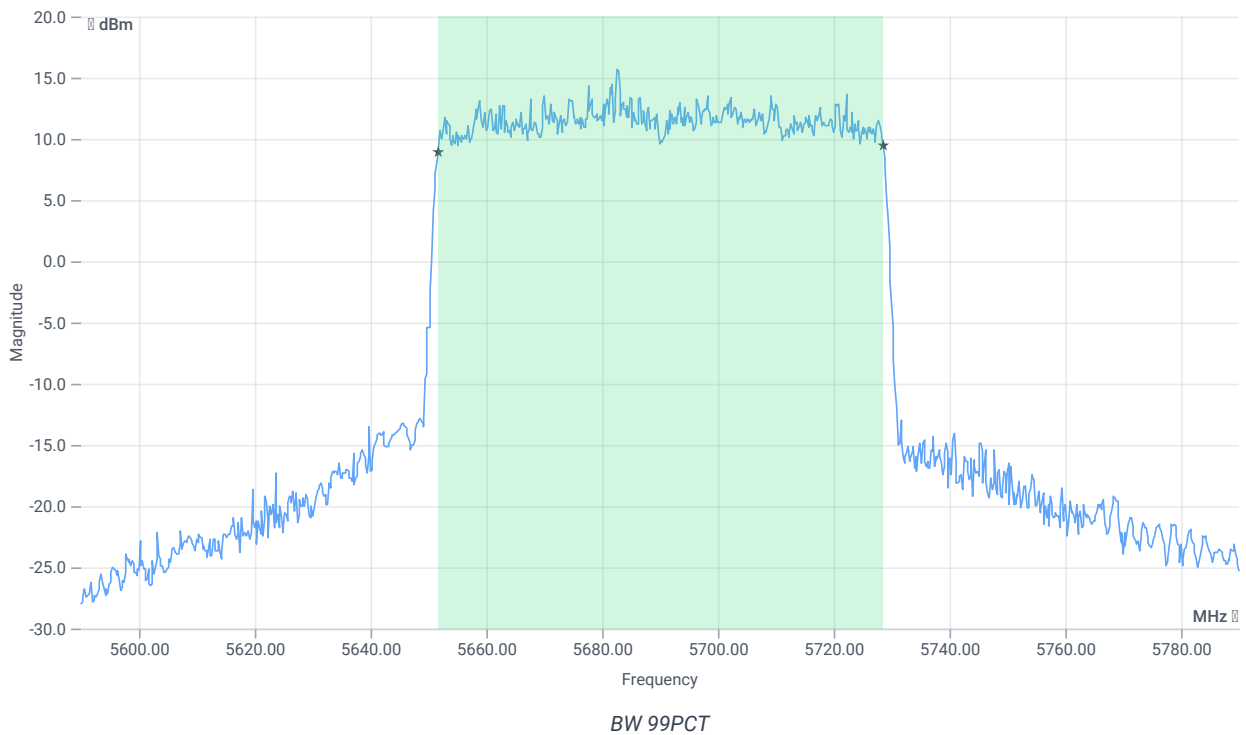
Test at TX 5690 MHz

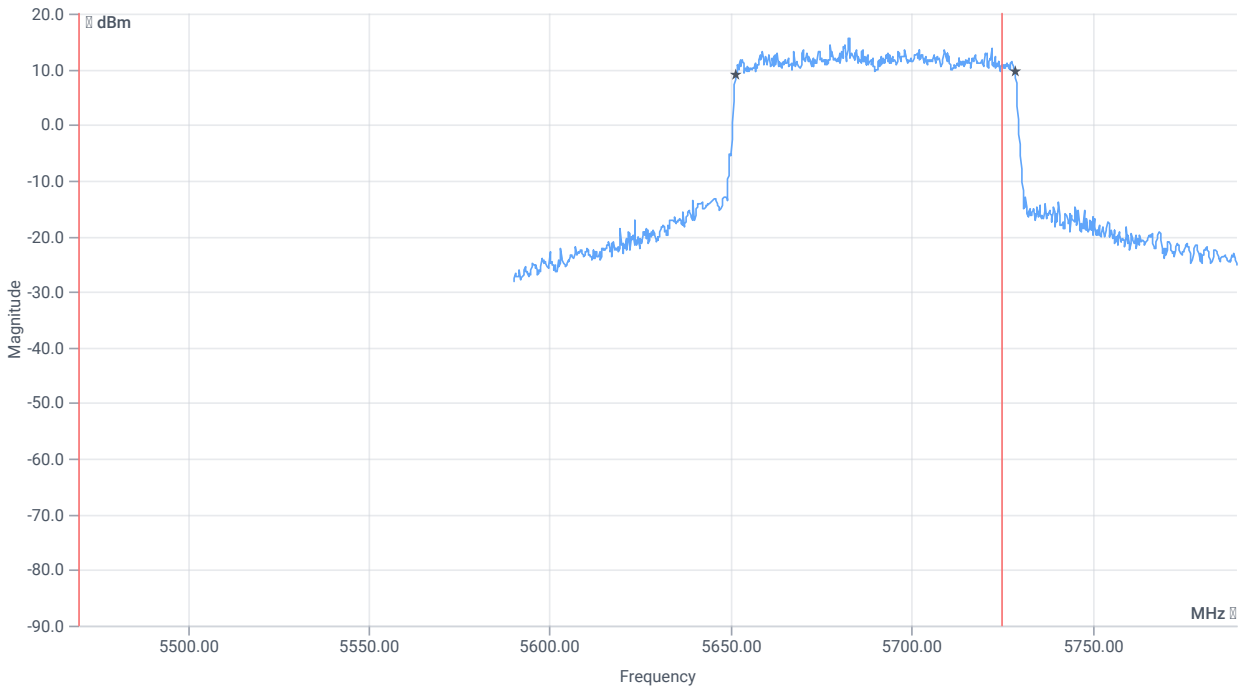
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	12.58	dBm	INFO
Ref. Frequency	--	--	5682.410	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	20.58 16.56 20
Start [MHz] Stop [MHz]	5590.000 5790.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

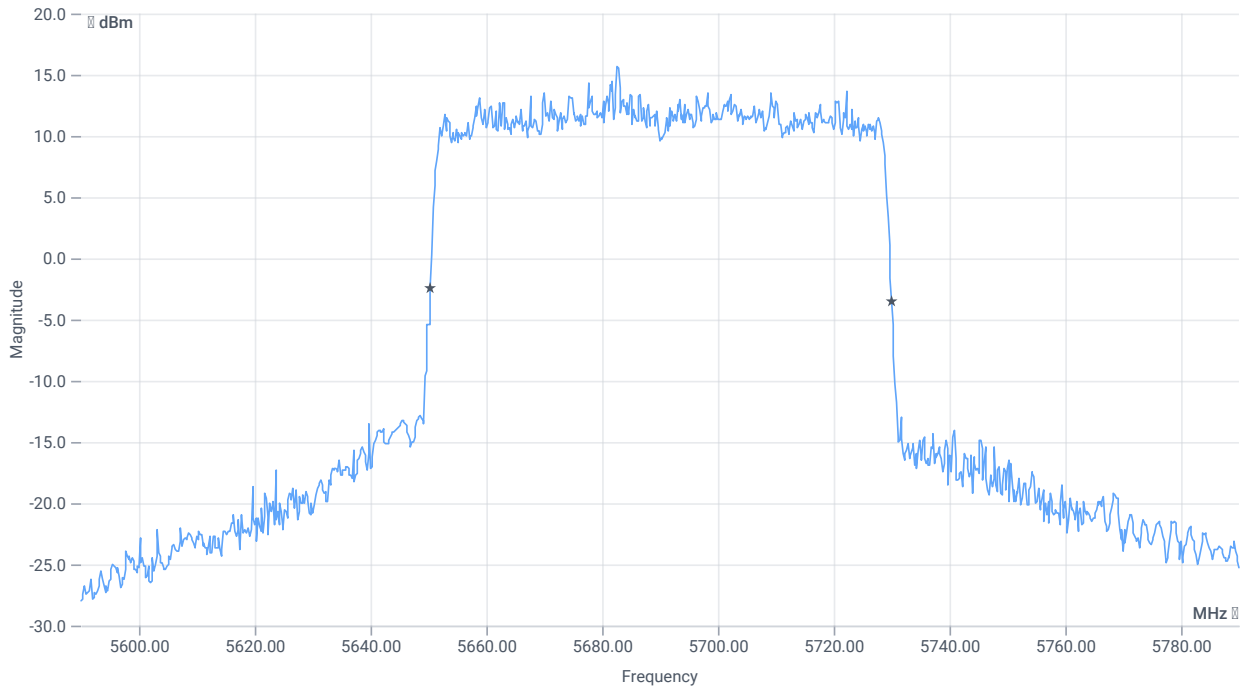




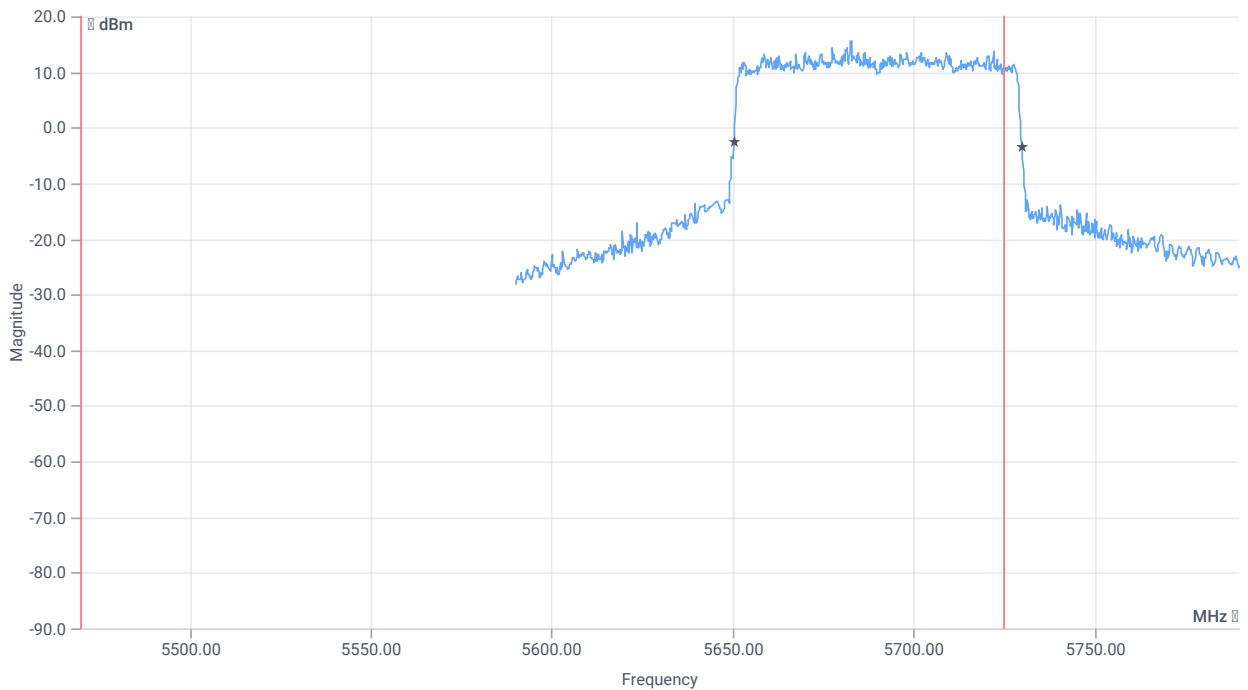
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	76.923	MHz	INFO
T1 99%	5470.000000	--	5651.6384	MHz	PASS since U-NII-3 is supported
T2 99%	--	5725.000000	5728.5614	MHz	



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	79.6	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 20dB	5470.000000	--	5650.4000	MHz	PASS since U-NII-3 is supported
T2 20dB	--	5725.000000	5730.0000	MHz	

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-2C

References

TC start	28.07.2023 12:20:44
Ambit temp [°C] humidity [rel%]	25.1 54
System version	4.6.0.1
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 5530
Frequency mid to test	False Freq [MHz] 5610
Frequency high to test	True Freq [MHz] 5690
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5690 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	20.16	dBm	INFO
Ant:1 BW 26dB	--	--	81.920	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	19.98	dBm	INFO
Ant:2 BW 26dB	--	--	81.120	MHz	INFO
Σ Limit absolute	--	24	23.08	dBm	PASS
Σ Limit: 11 dBm + 10 log 81.12	--	30.09	23.08	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	2.64	dBm/1MHz	INFO
Ant:2 PSD	--	--	2.46	dBm/1MHz	INFO
Σ	--	11	5.56	dBm/1MHz	PASS

Verdict

PASS

NA # Message with SA scan ~

References

TC start	02.08.2023 12:28:16
Ambit temp [°C] humidity [rel%]	25.0 52
System version	4.6.0.3
Standard Version	NA NI
Method	
Description	Message with SA Scan ax-HE80 U-NII-3
Information	PS88

Test Parameter

Switched Path	EUT - SignalingUnit - SpectrumAnalyzer
Message start	02.08.2023 12:28:16
Message	set WLAN5Gx to ax-HE80 U-NII-3, Frequency [MHz] 5775 , Information: PS88

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Verdict

INFO

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:28:43
Ambit temp [°C] humidity [rel%]	25.0 52
System version	4.6.0.3
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5775 MHz

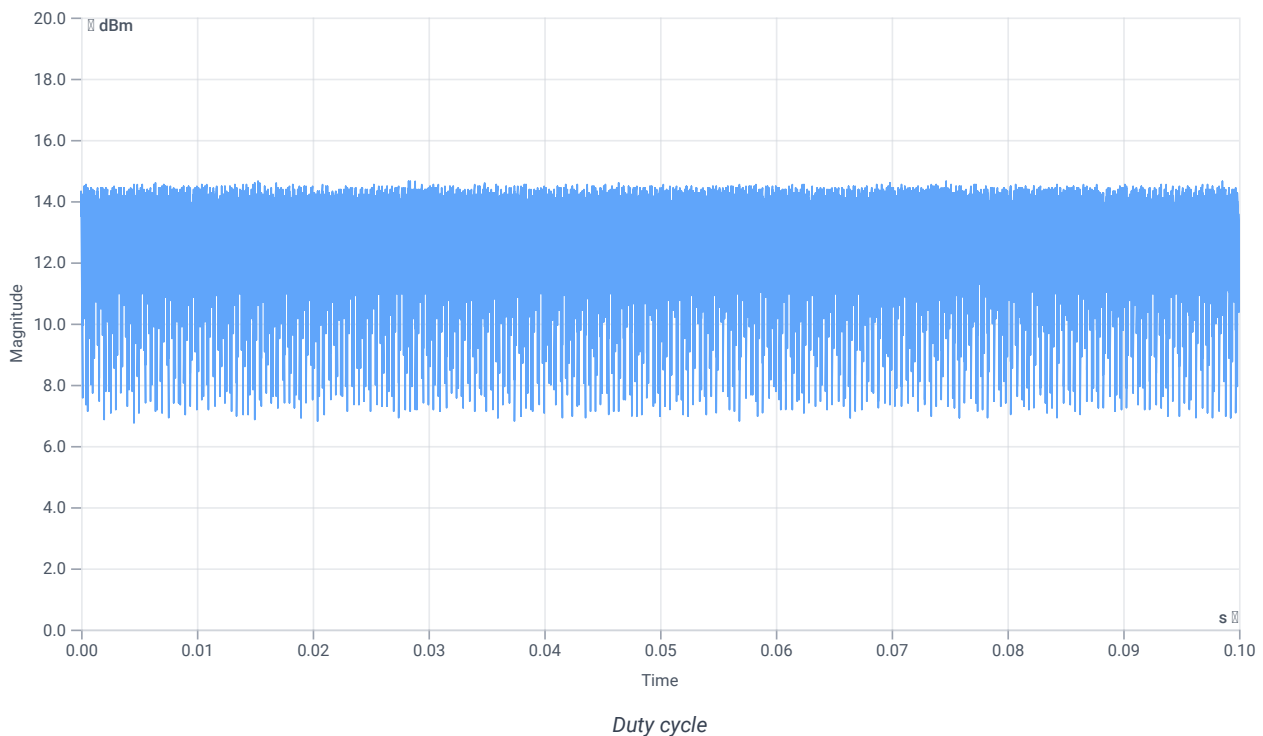
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.39	dBm	INFO
Ref. Frequency	--	--	5810.160	MHz	INFO

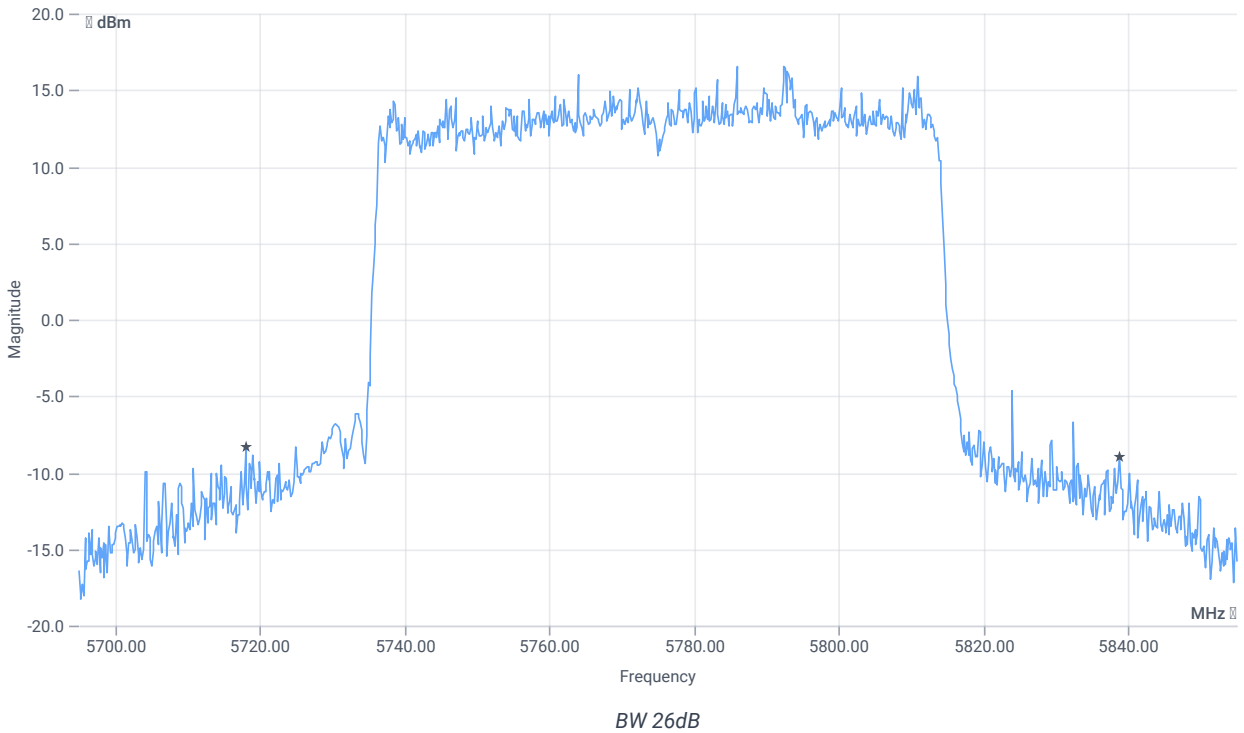
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



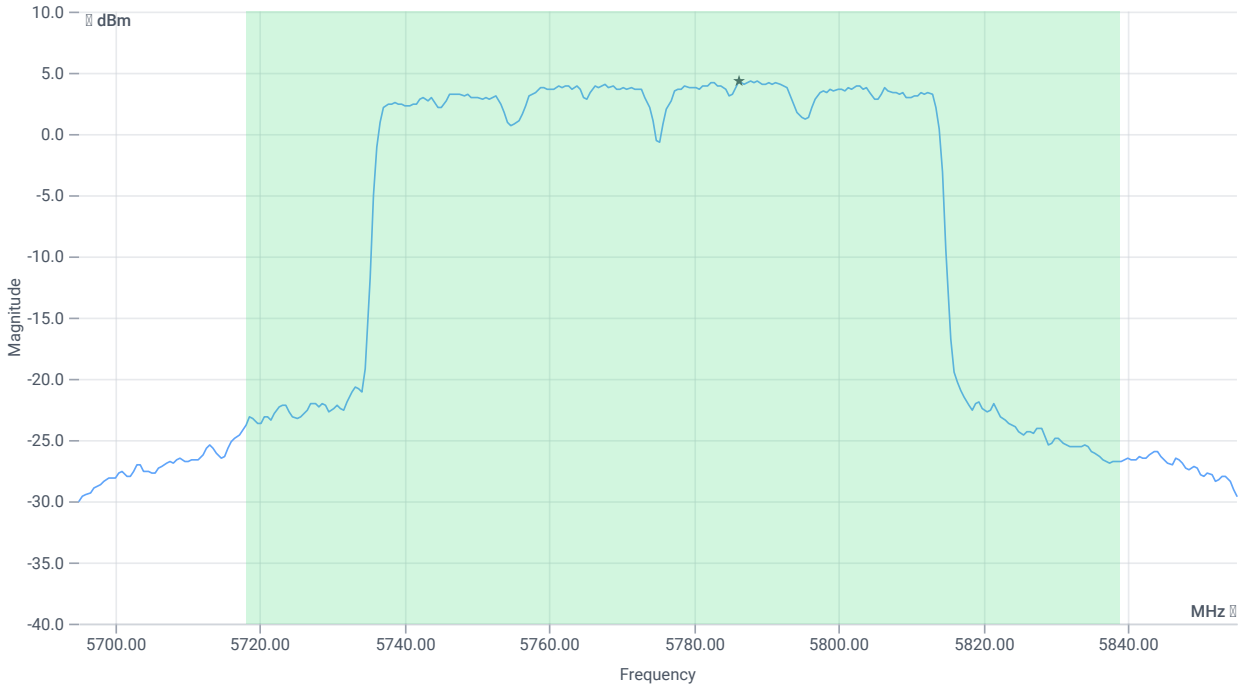
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	120.8	MHz	INFO
T1 26dB	---	---	5718.0400	MHz	INFO
T2 26dB	---	---	5838.8400	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.39 16.72 25
Start [MHz] Stop [MHz]	5695.000 5855.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

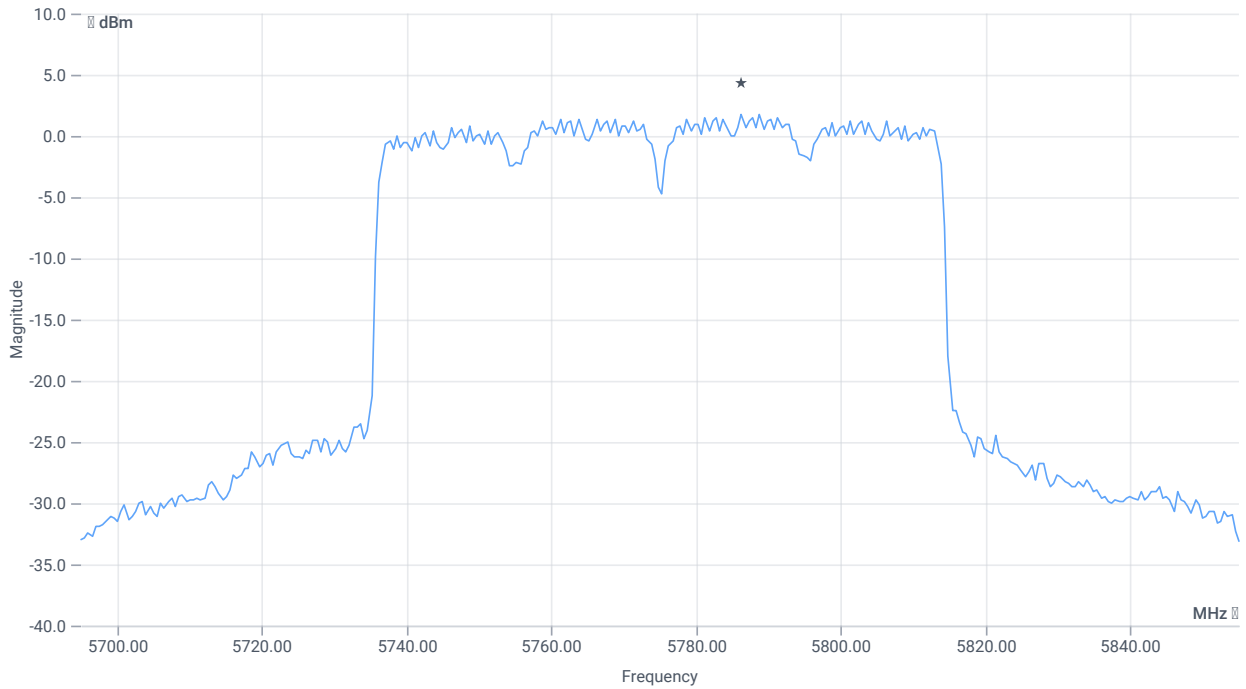
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	21.85	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	30	21.85	dBm	PASS
Limit: 11 dBm + 10 log 120.8					
Max Output Power DC corrected	--	31.82	21.85	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.39 16.72 25
Start [MHz] Stop [MHz]	5695.000 5855.000
RBW [MHz] VBW [MHz]	0.500000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	1.81	dBm/0.5MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	30	1.81	dBm/0.5MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:33:05
Ambit temp [°C] humidity [rel%]	25.0 53
System version	4.6.0.3
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

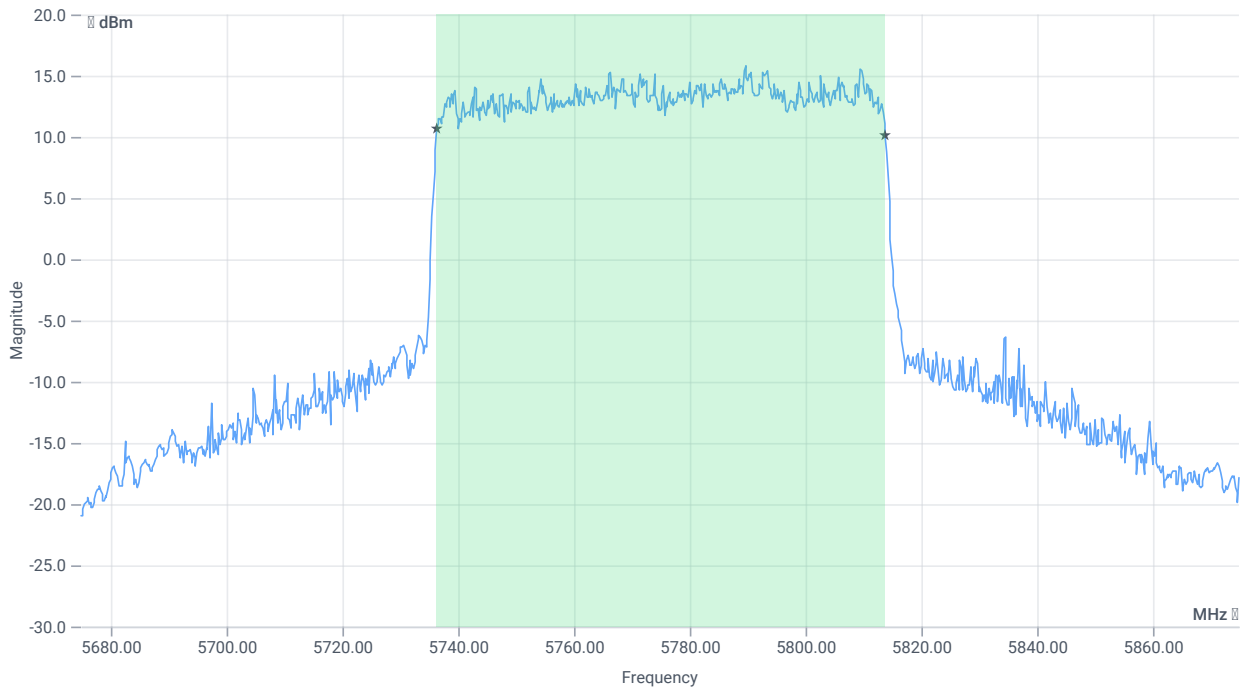
Test at TX 5775 MHz

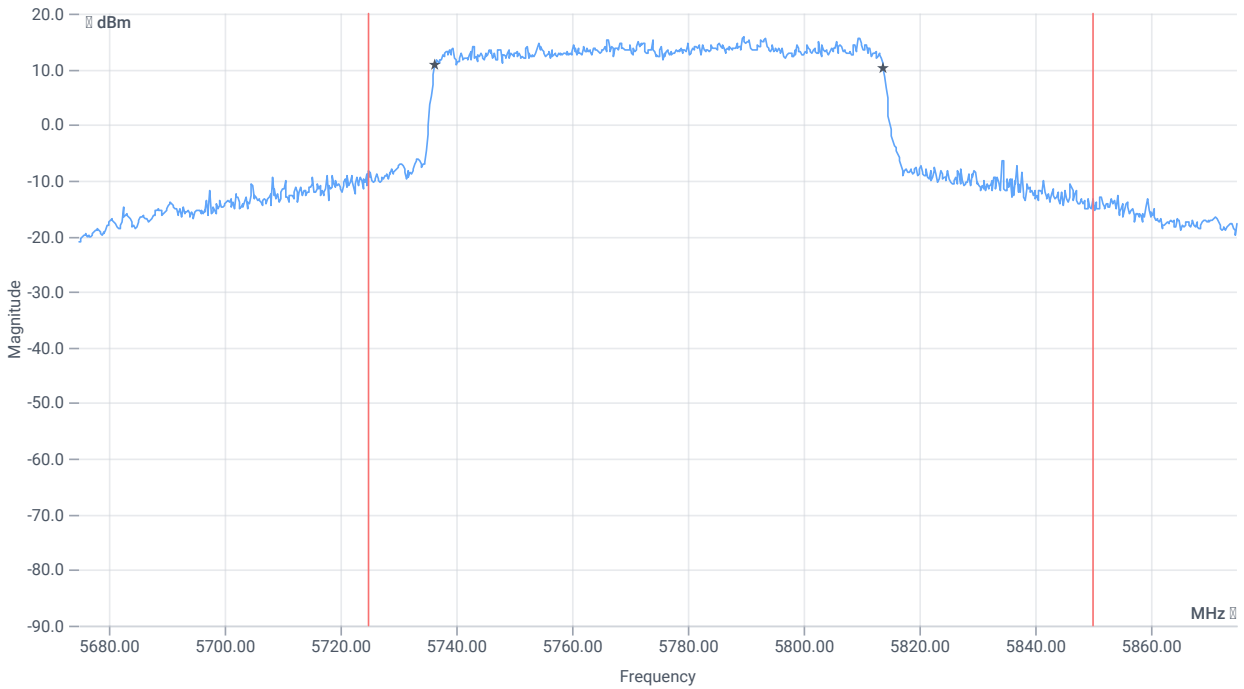
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.17	dBm	INFO
Ref. Frequency	--	--	5805.970	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	21.17 16.72 20
Start [MHz] Stop [MHz]	5675.000 5875.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

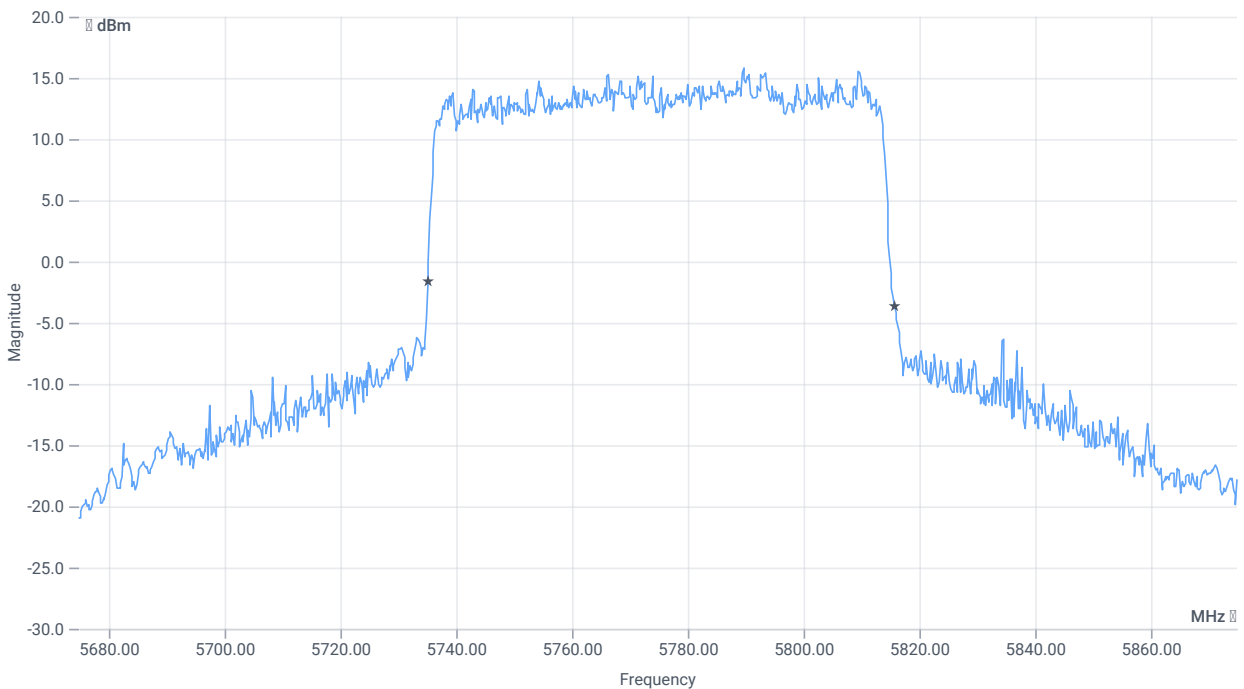


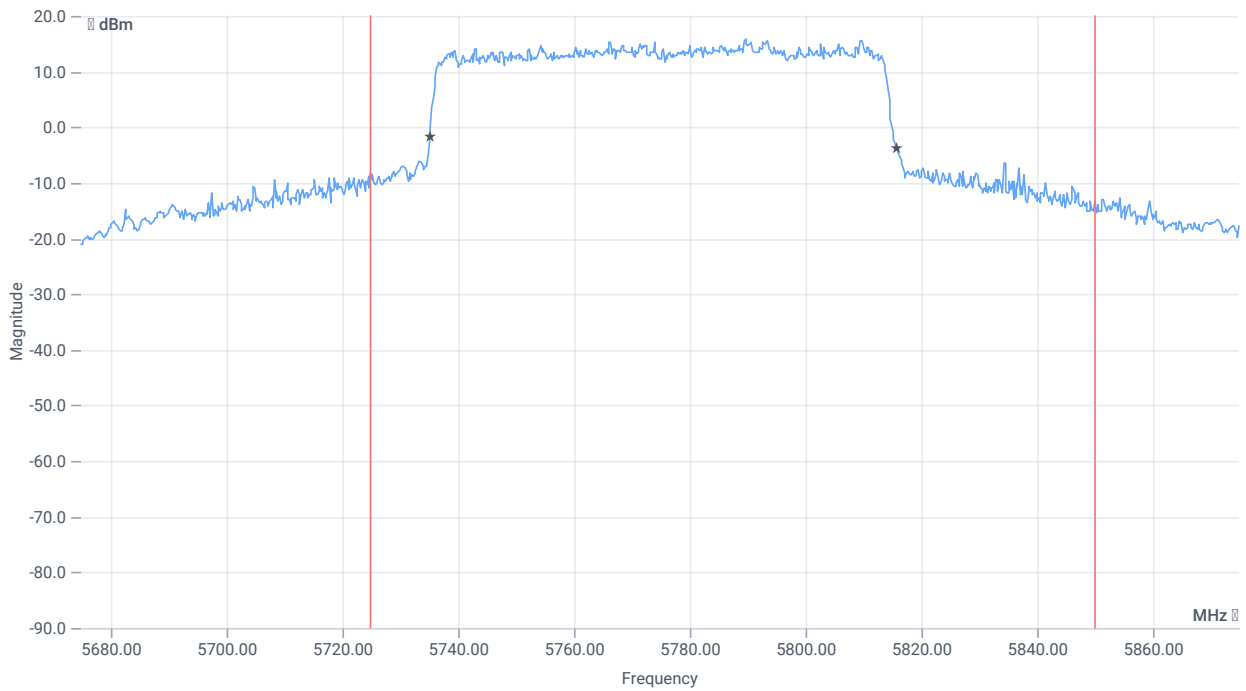


BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.522	MHz	INFO
T1 99%	5725.000000	--	5736.4386	MHz	PASS
T2 99%	--	5850.000000	5813.9610	MHz	PASS



BW 20dB

BW within Band 20dB
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	80.6	MHz	INFO
T1 20dB	5725.000000	---	5735.2000	MHz	PASS
T2 20dB	---	5850.000000	5815.8000	MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:33:43
Ambit temp [°C] humidity [rel%]	25.0 53
System version	4.6.0.3
Standard Version	FCC 15.407, ISED RSS247 NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

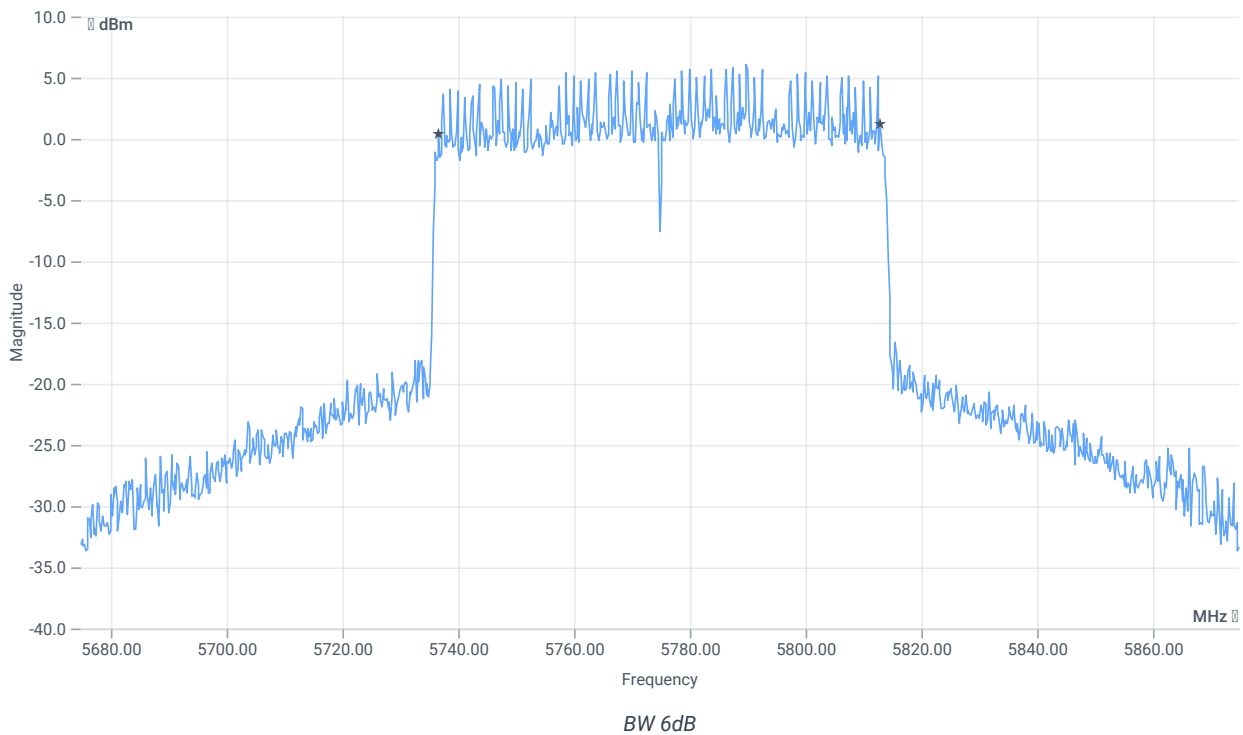
Test at TX 5775 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	15.44	dBm	INFO
Ref. Frequency	--	--	5810.960	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	27.44 16.72 30
Start [MHz] Stop [MHz]	5675.000 5875.000
RBW [MHz] VBW [MHz]	0.100000 0.300000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	2 1500 1001 SWE



RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	--	76.2	MHz	PASS

Verdict

PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:34:11
Ambit temp [°C] humidity [rel%]	25.0 53
System version	4.6.0.3
Standard Version	FCC 15.407 NI
Method	KDB789033 D02, F, E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5775 MHz

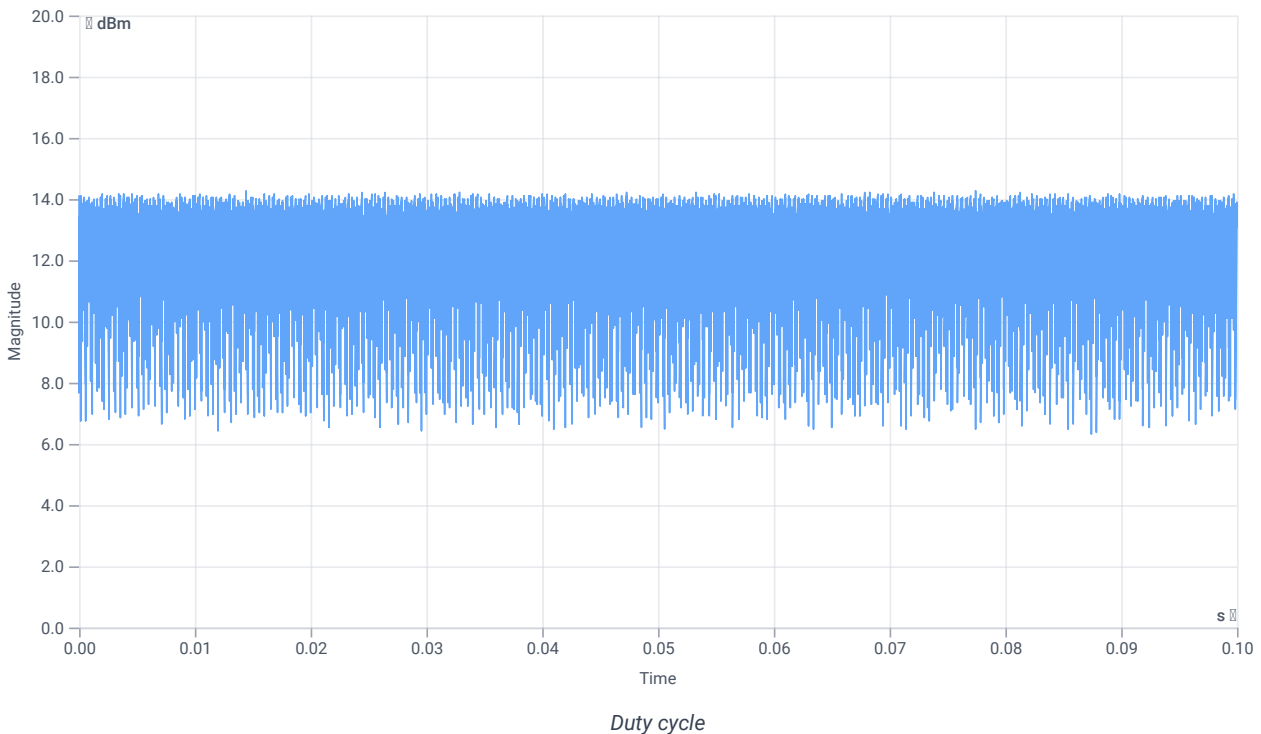
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.36	dBm	INFO
Ref. Frequency	--	--	5768.810	MHz	INFO

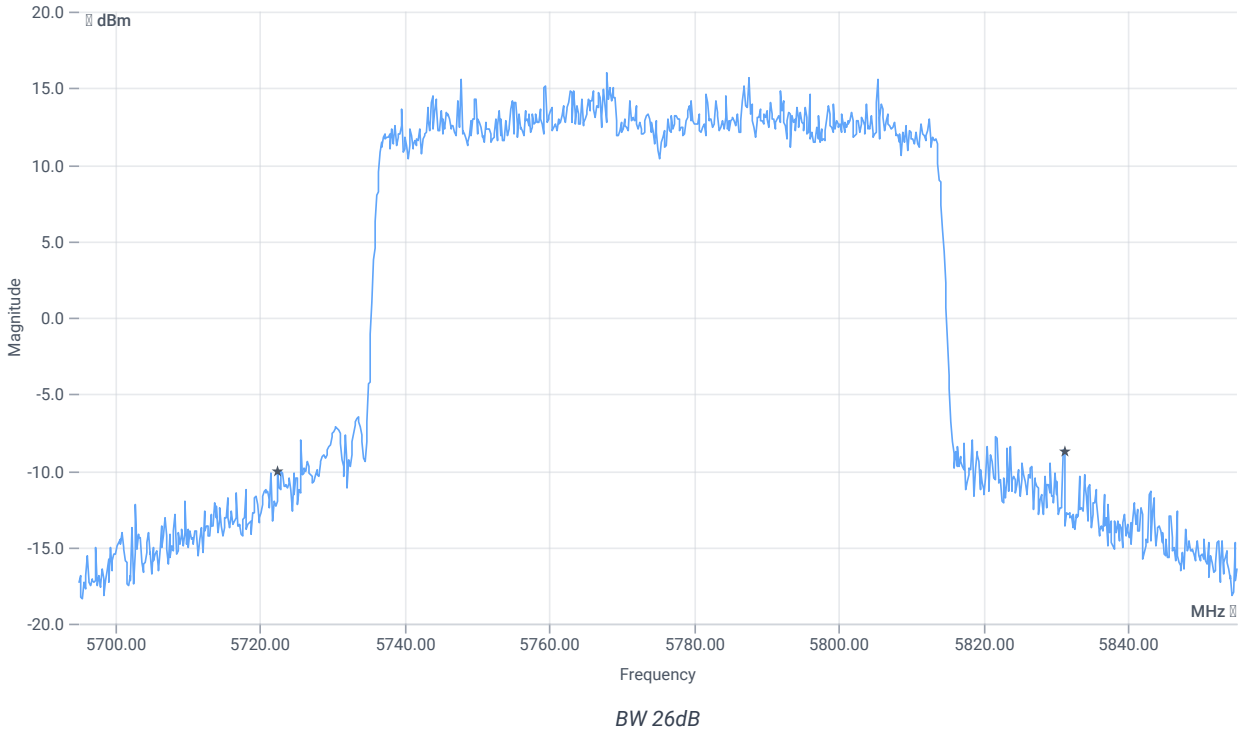
Evaluation max. Duty Cycle

Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
No enough Bursts detected, Duty Cycle Burst Ratio set to 1					
Duty Cycle (Burst Ratio) max	--	--	1	--	INFO
Duty Cycle max	--	--	0	dB	INFO
Duty Cycle (Burst Ratio) min	--	--	1	--	INFO
Duty Cycle min	--	--	0	dB	INFO



Evaluation Bandwidth



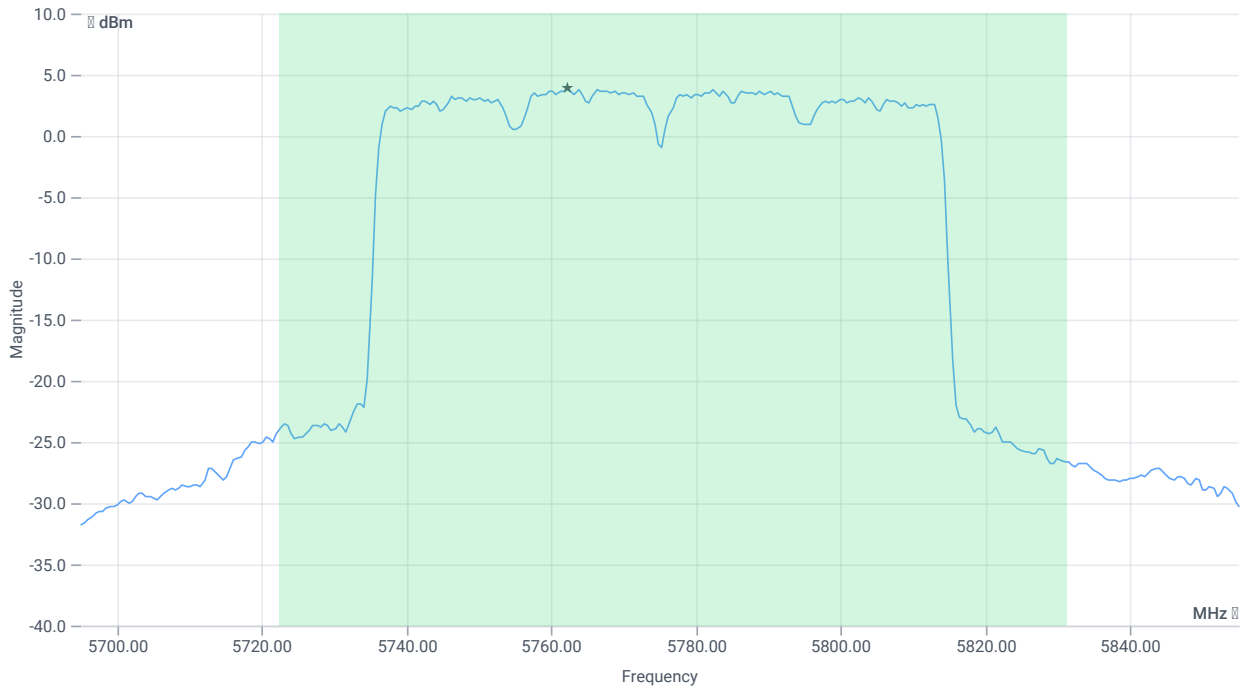
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	108.64	MHz	INFO
T1 26dB	---	---	5722.5200	MHz	INFO
T2 26dB	---	---	5831.1600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.36 16.72 25
Start [MHz] Stop [MHz]	5695.000 5855.000
RBW [MHz] VBW [MHz]	1.000000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



Max OP and PSD

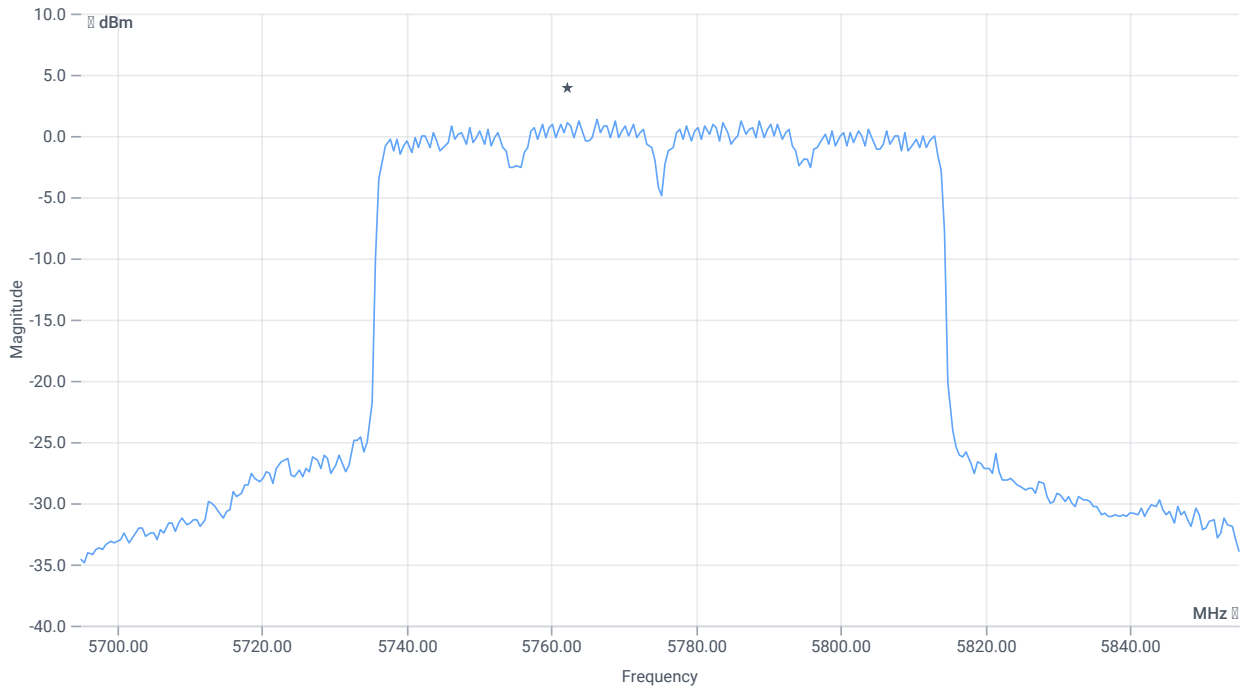
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	--	--	21.45	dBm	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Limit absolute					
Max Output Power DC corrected	--	30	21.45	dBm	PASS
Limit: 11 dBm + 10 log 108.64					
Max Output Power DC corrected	--	31.36	21.45	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.36 16.72 25
Start [MHz] Stop [MHz]	5695.000 5855.000
RBW [MHz] VBW [MHz]	0.500000 3.000000
Detector TraceMode	RMS MAXH
Sweep: time [ms] count points per Section type	107000 1 320 SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	--	--	1.35	dBm/0.5MHz	INFO
Duty Cycle Correction	--	--	0	dB	INFO
Power Spectral Density DC corrected	--	30	1.35	dBm/0.5MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:38:34
Ambit temp [°C] humidity [rel%]	24.8 55
System version	4.6.0.3
Standard Version	FCC 15.407, ISED RSS247 NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

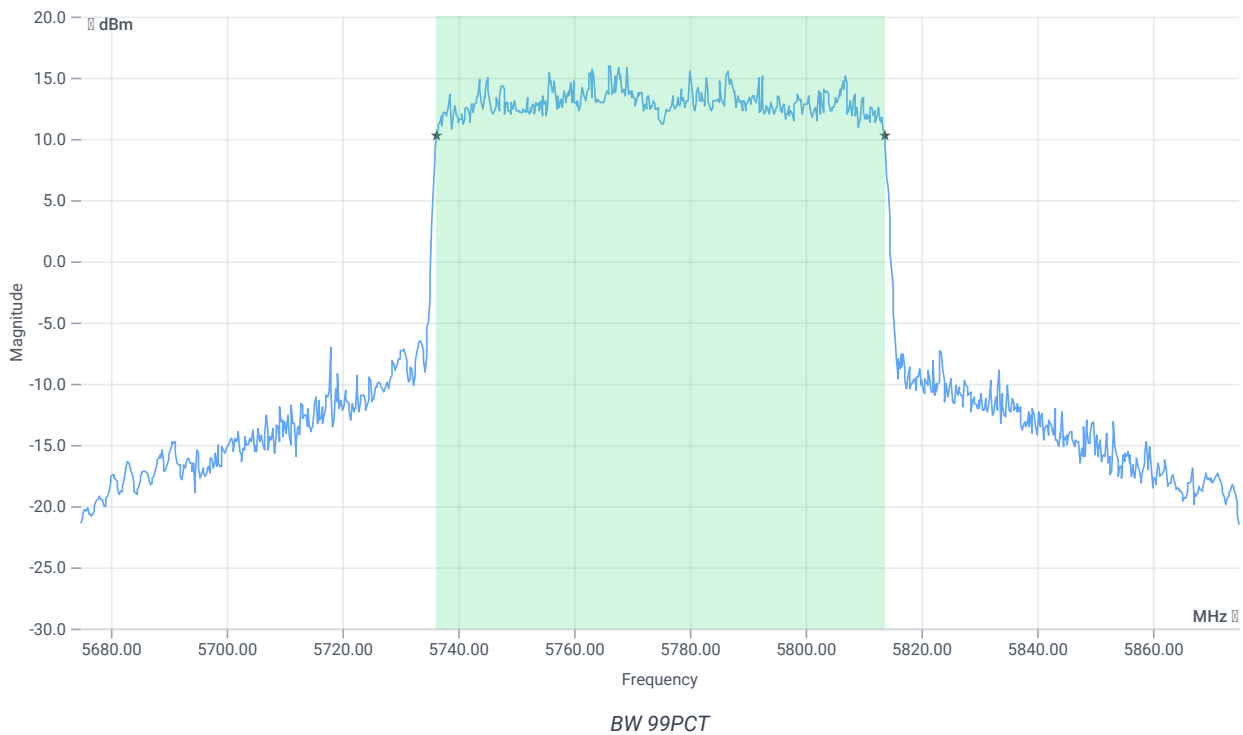
Test at TX 5775 MHz

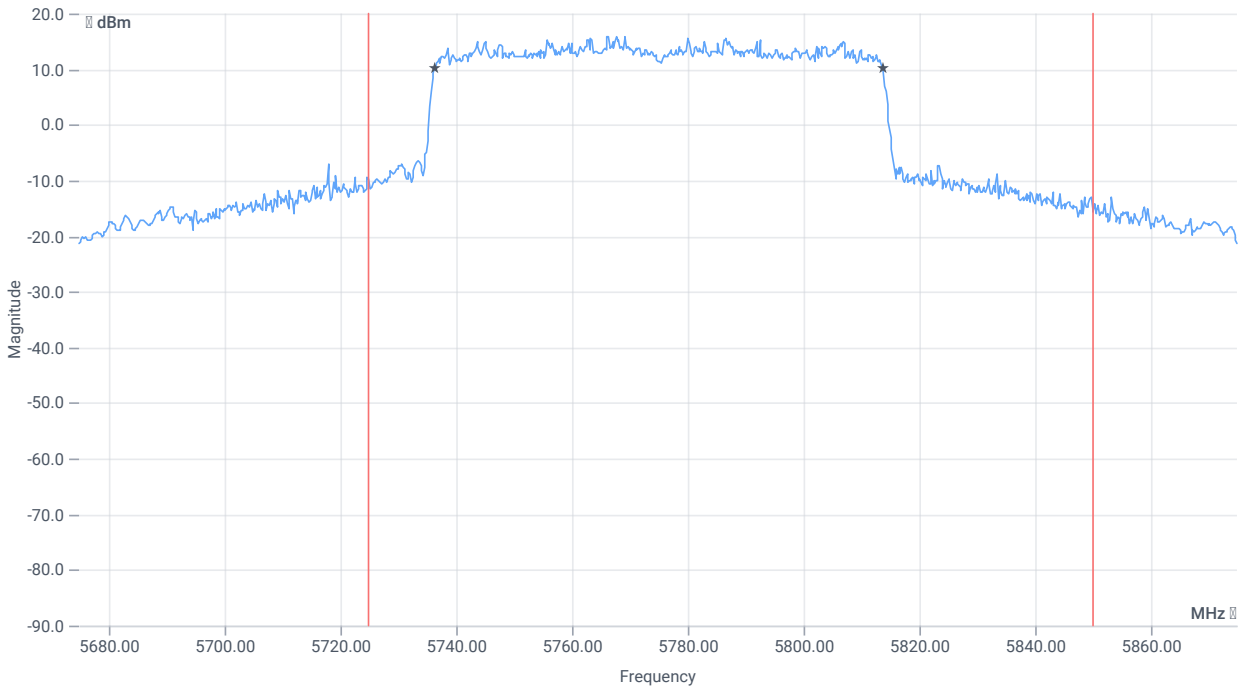
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.68	dBm	INFO
Ref. Frequency	--	--	5764.210	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	21.68 16.72 20
Start [MHz] Stop [MHz]	5675.000 5875.000
RBW [MHz] VBW [MHz]	1.000000 5.000000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	1 2500 1001 SWE

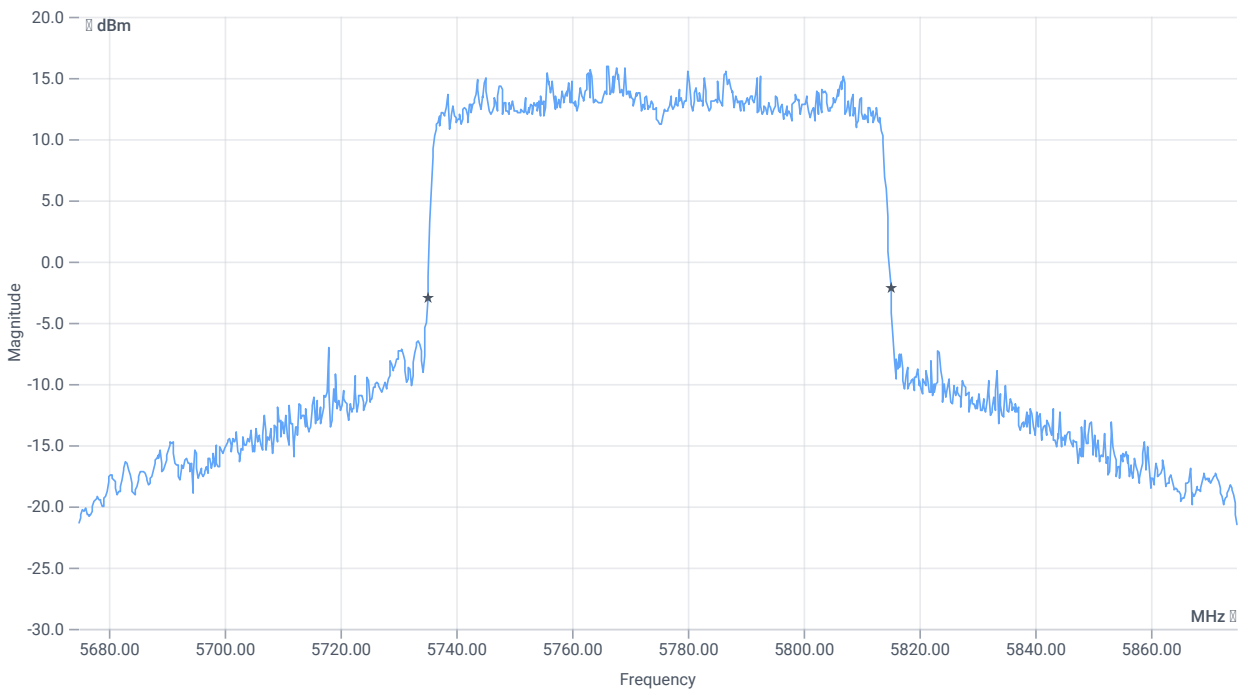




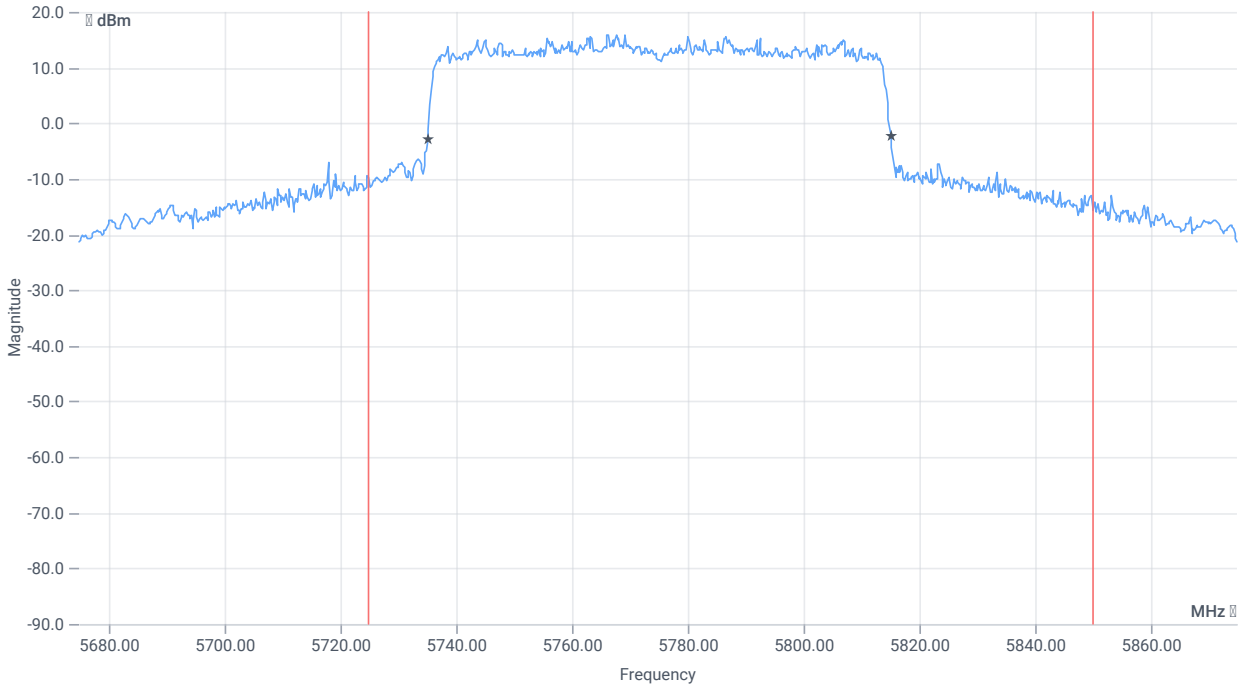
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	--	--	77.323	MHz	INFO
T1 99%	5725.000000	--	5736.4386	MHz	PASS
T2 99%	--	5850.000000	5813.7612	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	--	--	80	MHz	INFO
T1 20dB	5725.000000	--	5735.2000	MHz	PASS
T2 20dB	--	5850.000000	5815.2000	MHz	PASS

Verdict

PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:39:12
Ambit temp [°C] humidity [rel%]	24.9 55
System version	4.6.0.3
Standard Version	FCC 15.407, ISED RSS247 NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ax-HE80 U-NII-3
Information	PS88

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

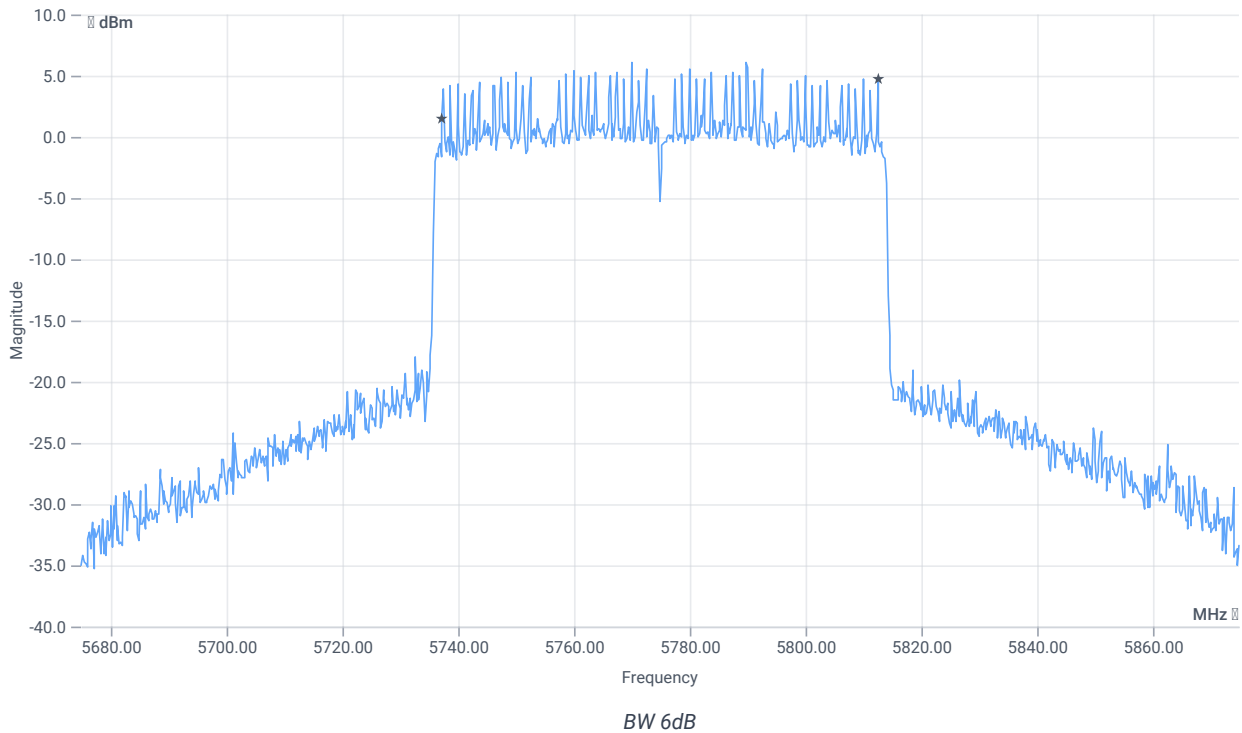
Test at TX 5775 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	--	--	13.54	dBm	INFO
Ref. Frequency	--	--	5786.990	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] RefLevelOffset [dB] InpAtt [dB]	25.54 16.72 25
Start [MHz] Stop [MHz]	5675.000 5875.000
RBW [MHz] VBW [MHz]	0.100000 0.300000
Detector TraceMode	POS MAXH
Sweep: time [ms] count points per Section type	2 1500 1001 SWE



RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	--	75.2	MHz	PASS

Verdict

PASS

FCC 15.407 # MIMO Σ Max output power and psd ~ WLAN5Gx ax-HE80 U-NII-3

References

TC start	02.08.2023 12:39:40
Ambit temp [°C] humidity [rel%]	24.8 55
System version	4.6.0.3
Standard Version	FCC 15.407 NI
Method	
Description	MIMO Σ FCC Power & psd - WLAN5Gx ax-HE80 U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	1
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ax-HE80
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False Freq [MHz] 0
Frequency mid to test	True Freq [MHz] 5775
Frequency high to test	False Freq [MHz] 0
Auto control enabled power supply Climatic Box	No No
Additional path loss [dB]	1.3
Switched path	None

Equipment

Test at TX 5775 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	--	--	21.85	dBm	INFO
Ant:1 BW 26dB	--	--	120.800	MHz	INFO
Ant:2 Max Output Power DC corrected	--	--	21.45	dBm	INFO
Ant:2 BW 26dB	--	--	108.640	MHz	INFO
Σ Limit absolute	--	30	24.66	dBm	PASS
Σ Limit: 11 dBm + 10 log 108.64	--	31.36	24.66	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	--	--	1.81	dBm/0.5MHz	INFO
Ant:2 PSD	--	--	1.35	dBm/0.5MHz	INFO
Σ	--	30	4.6	dBm/0.5MHz	PASS

Verdict

PASS

- END OF DOCUMENT -